

## CHAPTER A4

### Developing Professional Capability through Lifewide Education with a specific focus on students' creative development

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Norman has a long standing interest in creativity. Prior to SCEPTrE he was a senior advisor in the Higher Education Academy and the Learning and Teaching Support Network Generic Centre where, in 2001, he initiated the imaginative curriculum network. This helped to develop new understandings of creativity in higher education and ways in which students' creative development is supported and encouraged. Some of his work was published in a book by Routledge-Falmer; 'Developing Creativity in Higher Education: an imaginative curriculum'. To find out more about this work visit <http://imaginativecurriculumnetwork.pbworks.com/>.

#### Introduction

An education that is dominated by the mastery of content and cognitive performance in abstract situations, while a necessary part of the development of the specialist knowledge and critical thinking/problem solving capacities for a complex world – is not enough. To prepare students for the complexities of the professional world, we need to pay much more attention to the development of capability that will enable them to think with sufficient complexity to engage with the challenges they will encounter in the real professional worlds they will inhabit outside higher education.

This Chapter sets out the case for adopting a lifewide view of education in order to facilitate the development of the capabilities and dispositions necessary to be an effective professional and provides an example of the way one university is trying to create new educational practices that are consistent with this paradigm.

Our creativity is an important part of our capability for dealing with real world situations. Kaufman and Beghetto (2009) have proposed a model of creativity in which *Pro-c* creativity (the creativity we associate with professional expertise) occupies a real world space between *little-c* creativity (everyday incidental creative acts), *mini-c* (the personal and developmental acts of creativity that are associated with transformative learning and meaning making) and *Big-C* creativity (that with which we associate greatness and acts which change our culture).

The arguments advanced in this Chapter are that higher education has a major role to play in creating the environment in which students can advance their understanding and develop their capability and dispositions for the forms of creativity that are necessary to be an effective professional – the sorts of creativity that we associate with mastery and expertise in a professional domain

Our will to be creative usually stems from a deep intrinsic motivation inspired by the personal choices we are able to make in our life. We talk a lot about student-centred learning but if we respected the learner as the designer of their own life experience, which includes higher education as part of that experience, we would have more chance of embracing, supporting and recognising their capability to deal with real world situations and the creative acts embodied in such capability. We can move towards this situation by honouring students' creative spirit and encouraging them to fulfil their creative potential for dealing with situations in the real world by adopting and practising a lifewide concept of higher education.

The Chapter is in two parts. The first sets out arguments and propositions for a higher education curriculum that would help students develop their capability for the modern world: capability that includes their creativity. The second part shows how the University of Surrey is trying to implement lifewide education and how the propositions developed in the first part of the paper are being enacted. The theme of developing creativity through lifewide education is developed in two other e-book Chapters (Willis 2010a and 2010b).

## PART 1 Propositions for a More Complete Education

*The desire to do something because you find it deeply satisfying and personally challenging inspires the highest levels of creativity, whether it's in the arts, sciences or business' (Amabile 2008:3)*

### Real world context for creativity

John Dewey, who I admire greatly, is reputed to have said *"I believe that education.....is a process of living and not a preparation for future living."* My thesis is that it is both of these things.

'If the purpose of higher education is to help students develop their potential as fully as possible, then enabling students to develop and use their creative potential, should be an explicit and valued part of their higher education experience. This is clearly not the case..' (Jackson 2008a). I wrote this in 2008 at the start of a paper which framed the development of students' creativity in higher education as part of the wicked problem (Rittel and Webber 1973) of how we prepare students for a lifetime of working, learning and living in uncertain and unpredictable worlds.

Wicked problems emerge from the technical, informational, social, economic, political and cultural complexity that we are immersed in. The 'Credit Crunch' and ensuing recession is a good example. Such problems cannot be solved through rational, linear thinking because the problem definition and our understanding of it evolve as new possible solutions are invented and implemented. We are trying to prepare students for jobs that don't yet exist (or in the current recession that no longer exist!), using technologies that have not yet been invented, in order to solve problems that we don't know are problems yet. It may sound dramatic but the reality is that the majority of our students will have many careers, they will have to change organizations, roles and identities many times and be part of new organisations that they help create or existing organisations that they help to transform. Many will have to invent their own ways of earning an income and or create and juggle a portfolio of jobs requiring them to maintain several identities simultaneously.

Douglas Thomas and John Seeley Brown (2009:1) crystallise the educational challenge to living in a world of constant and rapid change thus.

'The educational needs of the 21st century pose a number of serious problems for current educational practices. First and foremost, we see the 21st century as a time that is characterized by constant change. Educational practices that focus on the transfer of static knowledge simply cannot keep up with the rapid rate of change. Practices that focus on adaptation or reaction to change fare better, but are still finding themselves outpaced by an environment that requires content to be updated almost as fast as it can be taught. What is required to succeed in education is a theory that is responsive to the context of constant flux, while at the same time is grounded in a theory of learning.'

While Ron Barnett (2000) summarises very well the challenge of preparing students for a supercomplex world.

'Higher education is faced with not just preparing students for a complex world, it is faced with preparing students for a supercomplex world. It is a world in which we are conceptually challenged and continually so.... This supercomplexity shows itself discursively in the world of work through terms such as flexibility, adaptability and self-reliance. In such terminology, we find a sense of individuals having to take responsibility for continually reconstituting themselves through their life span..... The curriculum might be understood as a set of more or less intentional strategies to produce – in each student – a set of subjectivities...but the required set of subjectivities (required for this supercomplex world) is unlikely to be made clear to higher education..... What is clear however are the essential features of performance namely - understanding (how do we develop the knowledge to learn?), self-identity (what are the unique set of qualities, abilities, attitudes, behaviours and beliefs that we bring to our engagements with the world?) and action (what repertoire of actions give us control over our own destiny?)' (Barnett 2000).

Looking beyond higher education to the professional worlds to which most of our students aspire we can see the sorts of qualities, skills, dispositions, agencies, ways of knowing and being that are required through the study of professionals doing what they do in their work environments (eg Eraut 1994, 2007 and 2008, Raelin 2007, Dreyfus and Dreyfus 2005, Billett 2009). While higher education has always sort to prepare learners for these professional worlds, the challenge is embedded in the

question 'can we create even better educational designs that will enable learners to be better prepared for the sort of world we imagine in the future?'

The problem is that the specific problem of students' creative development in our higher education system seems trivial compared to the mega problems the world is trying to deal with – like the current recession. I argue that the problem of creativity in any education system is fundamental to enabling that society to grapple with the wicked problems that are part of living on a planet that is full of social and natural complexity. But it is not that creativity is absent in higher education rather, that it is all too often taken for granted and subsumed within the critical analytic ways of thinking that dominate the academic intellectual territory. Paradoxically, the core enterprise of research – the production of new knowledge – is generally seen as an objective systematic activity rather than a creative activity that combines, in imaginative ways, objective and more intuitive forms of thinking. The most critical argument for higher education to take creativity in students' learning more seriously is that creativity lies at the heart of learning and performing in any subject-based context and the highest levels of both are often the most creative acts of all. Our problem then becomes one of co-creating this understanding within different disciplinary academic communities

The explicit development (intentional and designed) of students' creative potential is not a chronic problem, in the sense that the vast majority of teachers believe there is an issue to be urgently addressed. Rather, we should see this challenge as an integral part of the problem of preparing students for the complexities that lie ahead and as an opportunity to make a positive difference to students' future lives – which grounds us in the moral purpose of education (Jackson 2006a, 2008a). The rest of this paper examines this case from the perspective of preparing students for the real world outside formal education which is full of complexity.

## Creativity and complexity

Humans have always had to deal with complexity and we have become who we are because over and over again someone has mastered complexity and created wisdom that has then been incorporated into the social consciousness (Figure 1). Such wisdom is full of integrative (connected, synthetic, relational and experiential) learning and it requires both analytical and critical reasoning and more associative and imagining ways of thinking. Integrative thinking is itself a creative process.

But the challenges of the modern world are not the same as they were twenty years ago and in twenty years time they will be significantly different again: the world is in a constant state of flux. We have to prepare students not just for the complexity they face here and now but lay the foundations for how they will deal with unknowable change and complexities they will have to grapple with thirty years from now. The challenge is to find the most effective and authentic ways of achieving this aim.

The human condition is to try to understand and respond to situations or to create new situations to achieve a goal the process involves imagination, use of our learning, searching for information and answers, thinking with complexity and creating and sharing wisdom through the cultures we create and inhabit! Complex thinking must involve the critical and the creative dimensions of thought, it must involve abstract/mental/imaginative representations and learning gained through direct observation and experience.

**Figure 1** We need to be able to think with sufficient complexity to understand the consequences of our actions. Source not known



It is not easy to represent the sorts of learning we need to survive, prosper and feel a sense of fulfilment in this complex world. The following sections explore a range of perspectives on human forms of knowing and agency and convey the complexity of the multiplicity of contexts which learners are both simultaneously in and preparing themselves for. Figure 2 conveys some of the complexities of the learning, personal and professional development required to 'perform, invent and adapt' in an uncertain, ever changing and perpetually challenging world through a symbolic drawing.

**Figure 2 SCEPTRe's symbolic image of learner as the designer, creator and integrator of their own learning and experiences within which notions of man the knower, man the maker and man the player can be integrated. Any complex performance requires these integrative ways of thinking, doing and being.**



At the heart of this metaphoric image is the notion of 'will' (Barnett 2005) the willingness to learn through the whole of life's experiences, the willingness to see self-development as a holistic and integrated process which evolves through participation in the opportunities that life affords, the willingness to be creative.

Stephen Covey's expression of human agency (Covey 2004: 4) is both relevant and inspiring.

'Between stimulus and response there is a space. In the space lies our freedom and power to choose our response. In those choices lie our growth and our happiness.'

This freedom to choose space is rich in affordances. It represents the decision space at the heart of every situation we participate in – the fundamental building block of daily life. But it also represents the decision space that relates to who we are and who we want to become. Both concepts are relevant and central to our individual creativity.

Covey goes on to elaborate the unique personal significance we all possess – 'the voice of hope, intelligence, resilience, and the limitless potential to effect positive change.'

'Voice lies at the nexus of talent (your natural gifts and strengths), passion (those things that naturally energise, excite and motivate you); need (including what the world needs enough to pay you for); and conscience (that still small voice within you that assures you of what is right and that prompts you to actually do it)' (Covey 2004:5).

This set of ideas and meanings connects in a profound way the idea of will and self-identity, capability and purposes so necessary for creative action within an ethical framework that guides and inspires personal decisions and actions. The challenge that such a profound set of ideas poses for higher education is *how do we nurture and respond to an individual's voice? How do we give learners the freedom to choose in a higher education world that demands so much compliance?*



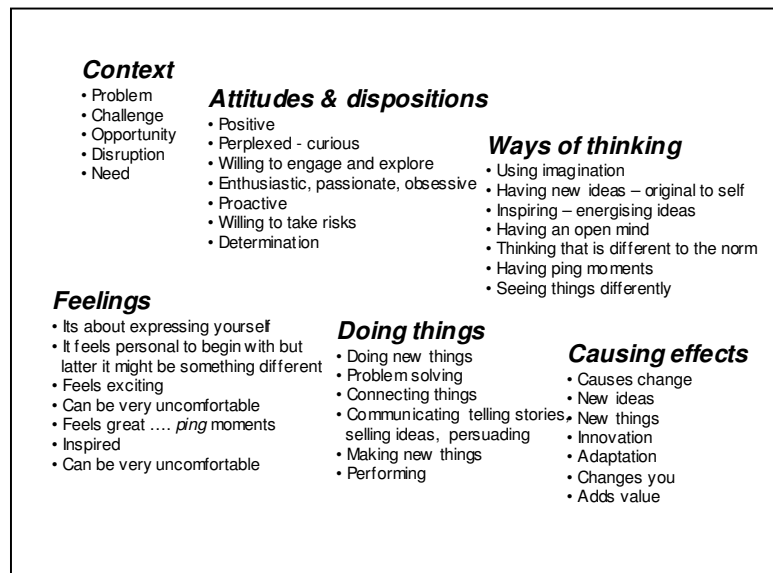
This idea of giving learners the freedom to choose and act in the belief that it will inspire and empower at least some of them to be creative has been the driving force for the work we have undertaken at Surrey to develop and grow the concept and practice of life-wide education.

## Meanings of creativity

According to wikipedia, creativity is the ability to generate innovative ideas and manifest them from thought into reality. The process involves original thinking and then producing. The use of innovative ideas emphasises the utility of the idea in this definition.

The things we associate with creativity in everyday life are identified in Figure 3. They involve the contexts –to stimulate creative thinking and action, attitudes and dispositions, ways of thinking and feeling, ways of behaving and doing things to turn ideas into reality and the results of doing things. This shows, in a very general way, what the dimensions of capability involving creative thought and action, might look like.

**Figure 3 Things people in higher education associate with being creative**



## Meanings of creativity in academic disciplinary communities

Jackson and Shaw (2006) reveal that academics associate a number of features with creativity regardless of disciplinary, pedagogic or problem working context. For example

*Being imaginative* – generating new ideas, thinking out of the boxes we normally inhabit, looking beyond the obvious, seeing the world in different ways so that it can be explored and understood better.

*Being original.* This embodies:

- the *quality of newness* for example: *inventing* and producing new things or doing things no one has done before;
- being *inventive with someone else's ideas* – recreation, reconstruction, re-contextualization, redefinition, adapting things that have been done before, doing things that have been done before but differently;
- and, *the idea of significance and value* – there are different levels and notions of significance and utility and value are integral to the idea.

*Being curious with an enquiring disposition* – willing to explore, experiment and take risks i.e. the attitude and motivation to engage in exploration and the ability to search purposefully in appropriate ways in order to find and discover. It is necessary to work in an uncertain world and often requires people to move from the known to the unknown.

*Being resourceful* – using your knowledge, capability, relationships, powers to persuade and influence, and physical resources to overcome whatever challenge or problems are encountered and to exploit opportunities as they arise.

*Being able to combine, connect, synthesise* complex and incomplete data/situations/ideas/ contexts in order to see the world freshly/differently to understand it better.

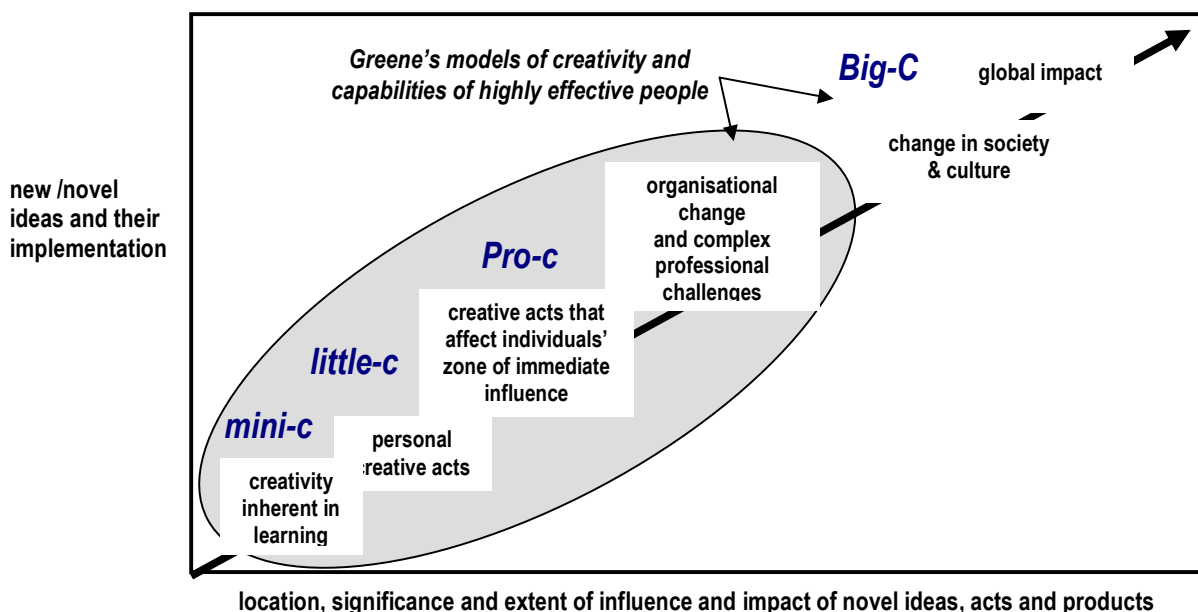
*Being able to think critically and analytically* in order to distinguish useful ideas from those that are not so useful and make good decisions. Being able to take value from feedback and use it constructively to improve ideas,

*Being able to represent ideas and communicate them to others* – the capacity to create and tell stories, pitch and sell ideas, empathize with others and show people possibilities, opportunities and solutions in ways that make sense to them or capture their imagination.

There seems to be wide acceptance within higher education communities that these characteristics are generally applicable to most educational contexts.

One of the difficulties we have with the idea of creativity is that we need some way of discriminating between the level and scale of its effects. We might represent this in a simple way using the ideas of newness/novelty or significance in terms of scale of effect (Figure 3). This Chapter argues that creativity is an integral part of an individual's capability to solve problems and influence the situations which they encounter or create. For the most part we are dealing with the creative thoughts and acts that affect an individual's immediate zone of influence – the people and situations they personally interact with. More rarely, with creative acts that bring about change in networks, organisations and fields beyond the individual's immediate zone of influence and exceptionally with greatness – those novel ideas and acts that change society and culture.

**Figure 3 Schematic representation of the relationship between creative (new) ideas and the scope of their effects which determine the social view on the significance of a creative idea and its physical manifestation. Also shown is the 'Four-C' model of creativity developed by Kaufman and Beghetto (2009) and Greene's (2001) models of creativity and his (2004) capabilities of highly effective people (see also Appendix 1) which help frame the complex patterns of thought, disposition and action through which significant creative acts are performed.**



Kaufman and Beghetto (2009 and Figure 2) proposed a conception of creativity and its application that embraces, 1) the personally meaningful micro-acts of creativity that attend our everyday lives (*little-c* or everyday creativity of Richards 2007), 2) *mini-c* – the creativity inherent in the learning process, the *novel and personally meaningful interpretation of experiences, actions and events* (Beghetto and Kaufman 2007) and 4) *Big-C* – eminent, creative contributions that have significant impact on the world. Everyday, students in higher education are engaged in the mini and little forms of creativity and we can do much more than we currently do to recognise and value this. But the arguments advanced in this Chapter are that higher education has a major role to play in creating the environment in which students can advance their understanding and develop their capability and dispositions for the forms of creativity that are necessary to be an effective professional – the sorts of creativity that we associate with mastery and expertise in a professional domain.

Richard Greene (2001, 2004) provides the most comprehensive view of how Pro-c creativity might operate within a framework of diverse models of creativity and personal capability. His paper '32 capabilities of highly effective people in any field' (Greene 2004<sup>1</sup>) shows the complex way in which creativity might manifest itself in the thinking, feelings, actions, behaviours and personal missions of highly effective people

'Highly effective people have eight general capabilities. The first four such capabilities are ways of using liberty they make for constructing, establishing, and founding enduring changes in lives and the world. They have ways, when encountering difference and otherness, of keeping what is new, difficult, and unknown or challenging from being absorbed and assimilated to their existing models and preferences. They have ways of preserving the otherness of what they encounter. Second, they have ways of unearthing the most buried, subtle, intimate, and vital forces and things inside themselves and examining them for possible use or improvement. Third, they have ways of bringing order to their own selves and to the selves of those in groups around them. Fourth, they have ways of turning insights, ideas, experiences, and the like into impacts on society, actual changes in how things are arranged and done. The second four general effectiveness capabilities are ways of protecting novelty from erosion by large, traditional, already established powers of the world. Fifth, they have ways doing things with style and verve rather than doing them perfunctorily. Sixth, they have ways of upping the performance of all dimensions of their selves, work, and lives, not just some or a few. Seventh, they have ways of influencing people, in many channels, modes, and means. Eighth, and last, they have ways of operating with new commonsenses, they borrow or invent, that make their automatic reactions up-to-date and future-looking.' (Greene 2004:5)

## Knowledge and knowing

How learners understand the way they develop the knowledge necessary for being and performing in the world, that is relevant to their needs and ambitions and the societies they live and work in, is of fundamental importance as we rethink our strategies for preparing them for their future. The question of learner epistemology: such questions as *what is knowledge? how is it acquired? what do they know? how do they know what they know? how do they use their knowledge to develop more knowledge?* is of higher order significance than questions about pedagogy which should follow.

If we want to support the development of learners as thinkers who can integrate their analytical and creative thinking and action in the manner caricatured in (Figure 1) then we need to understand the epistemology that connects learning and practice (using the idea that practice is about people working on purposeful activity to achieve their goals regardless of whether they are studying or in a job).

The main problem with traditional higher education as a vehicle for preparing learners for the complexities of the world ahead of them is that it seems to take such a narrow view of what learning and knowledge is. Higher education is pre-occupied with codified knowledge and with its utilisation by learners in abstract hypothetical problem solving. This is not to say that handling complex information in this way is not useful – far from it: it is an essential process for enabling students to learn how to think about and work with complexity. If we adopt the idea of *work* as our overarching context for integrative learning and we take Michael Eraut's (2009) rich conception of personal knowledge we can gain a better understanding of the scope for the sources of knowledge that learners draw upon in a life-wide learning context.

<sup>1</sup> I argue (Eraut 2009:2 and 2010) that personal knowledge incorporates all of the following:

- *Codified knowledge* in the form(s) in which the person uses it

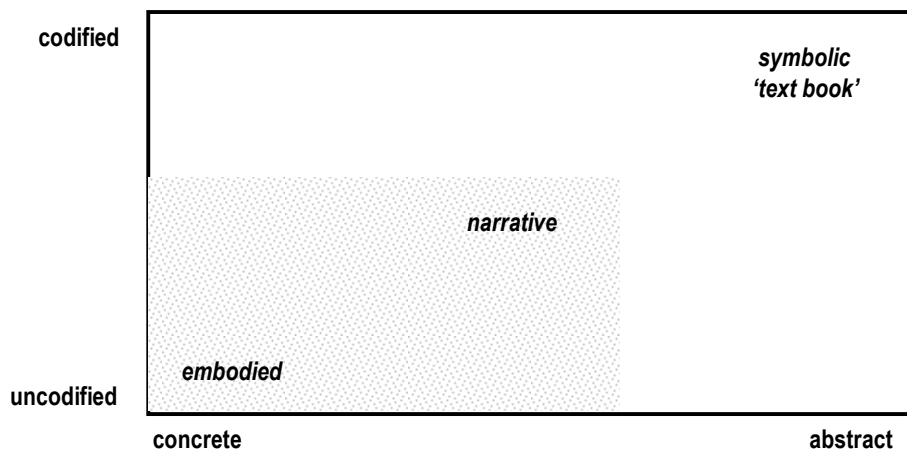
<sup>1</sup> an extract of which is reproduced in appendix 1



- *Know-how* in the form of *skills and practices*
- *Personal understandings of people and situations*
- *Accumulated memories of cases and episodic events* (Eraut, 2000, 2004)
- Other aspects of *personal expertise, practical wisdom* and *tacit knowledge*
- *Self-knowledge, attitudes, values and emotions.*

The evidence of personal knowledge comes mainly from observations of performance, and this implies a *holistic* rather than *fragmented* approach; because, unless one stops to deliberate, the knowledge one uses is already available in an *integrated form* and ready for action.'

**Figure 4 Conceptual framework for viewing knowledge developed by Max Boisott (1998 )**



Max Boisott (1998) provides another useful conceptual tool for viewing knowledge (Figure 4). Using the 2x2 matrix of codified /abstract and uncodified/concrete knowledge he shows schematically the nature of the knowledge that is embodied in everyday thinking and practices – our personalised working knowledge that we use to deal with situations, and the more abstract/ symbolic knowledge that has been made explicit through the writing down or recording in some other way. Narrative or story telling provides a communication medium, often rich in metaphor, that links these two domains. Our personal knowledge, described by Eraut (above) mainly populates the shaded area.

### **Man as knower, maker, player, narrator and enquirer<sup>2</sup>**

Thomas and Seeley Brown (2009) consider three basic domains of human behavior which correspond to mind, body, and imagination and three kinds of practices: knowing, constructing and playing. These three domains of learning, correspond to three broader frames: *Homo Sapiens* (human as knower), *Homo Faber* (human as maker) and *Homo Ludens* (human as player). While the caricature above emphasises man the knower, man would not develop such knowing without him also engaging in making and playing.

'it is the combination of all three [behaviours] and their interaction within a social and participatory context that deserves critical attention. In what follows, we map out the affordances of these three fundamental domains and then provide a model for how we might understand their interactions in the networked world'

*Homo Sapiens*: "(hu)man as knower" is a fundamental statement about what it means to be human. It is also an ontological statement about learning. The past decade has ushered in substantial changes in how we think about what it means to learn, based primarily in the context of rapid change in our networked world. There are three senses in which learning happens in relation to change. The most basic sense is "learning about" which corresponds to contexts in which information is stable. We

<sup>2</sup> The notes which follow are taken mainly from Thomas and Seeley Brown (2009)

learn about things which are stable and consistent and not likely to change over time. The second sense is “learning to be,” which requires engagement with an epistemic community and provides a sense of enculturation in practices which allow one to participate and learn how to learn and even shape practices within that community. The third sense, which emerges out of a context of rapid and continual change, is a sense of *becoming*. This sense of learning is itself always in a state of flux, characterized by a sense of acting, participating, and knowing.

Thomas and Seeley Brown (2009), argue that while the traditional model of learning has been grounded in the concept of “learning about,” the idea that knowledge is something to be studied and accumulated, new theories of learning have begun to understand the affordances in the networked world that privileges notions of “learning to be,” the ability to put the things we learn into action, often within the context of an epistemic community and going further the development of a sense of becoming through the act of participation in a networked community of interest.

*Homo Faber*: is “(Hu)man as maker,” stressing our ability to create. *Homo Faber* is more than simply making; it is making within a social context that values participation. It is akin to what Michael Polanyi (1967, 1974) has described as “indwelling,” the process by which we begin to comprehend and understand something by connecting to it and, literally, living and dwelling in it. In that way, making also taps into the richness of becoming. We learn through making, building, and shaping not to produce something static, but to engage in the process of participation. In fact, we may go so far as to say, there can be no sense of becoming, particularly as it relates to learning, without the dimension of *Homo Faber* as indwelling.

*Homo Faber*, constitutes *knowing* as an embodied set of experiences that we create through our practices of being in the world and attending to things in the world through our experiences with them. To know something *deeply* is to understand the explicit dimension through our embodied engagement with its tacit dimension. The rapid growth of the internet and the participatory cultures that are being developed through it (see next section) open up the possibility of this kind of deep knowing by providing the agency to participate, create and build, with the recognition that building is always being done within and also continually creating and remaking a social context. Most critically, within the context of a networked imagination, making is a creative process which shapes the social context in which the creation itself has meaning. In doing so, we can begin to see *Homo Faber* as creating an epistemology which is centred on *knowing and becoming*, rather than knowledge and being and which takes practices of fabrication, creation and participation as the cornerstones of learning. *Homo Faber* no longer divorces knowledge from knowing, or explicit from tacit understanding. Instead, *Homo Faber* invites us to think about the ways in which the two are inherently connected and supplemental to one another. Through creating we come to understand and comprehend the world, not merely as a set of object, artifacts, or creations, but as coherent entities which we come to dwell in and which we make sense of the “jointness” and interconnection of the parts that constitute the whole, both at the explicit level of the object itself and at the tacit level in terms of its social context and relations. It is this level of tacit knowledge, that which is known, embodied and most importantly *felt* that begins to constitute a basis for a new understanding of learning.

*Homo Ludens*: “(Hu)man as player” Huizinga’s (1950) thesis is that play is not merely central to the human experience; it is constitutive of all that is meaningful in human culture. Culture, he argues, does not create play; play creates culture. In almost every example of what he describes as the sacred, play is the central and defining feature of our most valued cultural rites and rituals. As such, for Huizinga, play is not something we do; it is who we are.

To truly understand the connection between play and learning, we need to fully grasp how play puts us in a different mindset. Play is a complex and complicated idea, which is usually held in opposition to most of what have been considered the most stable pillars of learning in the 20th century. Play is thought of as the opposite of work. It is fun, rather than serious. Its connection to learning is often seen as secondary or incidental.

Play is probably the most overlooked aspect in understanding how learning functions in culture. It is easy to identify spaces in which networked culture provides opportunities for play, video games being a clear example. But thinking about play as a cultural disposition, rather than as merely engaging with a game, reveals something more fundamental at work. Much of what makes play powerful as a learning environment is our ability to engage in processes of experimentation, which becomes the gateway to opening up the imagination. All systems of play are, at base, learning systems. They are ways of participating in complicated negotiations of meaning, interaction, and competition, not only for entertainment, but also for the making of meaning. Most critically, play reveals a structure of learning that is radically different from what most structured learning environments create, one which is almost ideally suited to the notions of flux and becoming outlined above. In play we are presented with yet a third perspective on learning in a world of constant flux. In the case of play, the process is no longer smooth and progressive, but is constituted by a gap between the facts or knowledge we are given and the end result or outcome we wish to achieve. This dynamic accelerates in the context of flux and rapid change, where stable paths and linear

progression are no longer viable. What play provides is the opportunity to leap, to experiment, to fail, to fail and continue to play with different outcomes or to “riddle” one’s way through a mystery. That leap that you take is more than simply a means to cross the chasm between what you know and what you want to achieve: it is an *organizing principle*. Figuring out a riddle is more than simply getting the right answer. It is an answer which organizes and makes sense of the riddle. In that sense, our understanding comes not from a linear progression, but, instead, by imagining the problem from all angles, but ultimately seeing its logic only at the end.

Perhaps most critical in this sense of play is the way in which the sense of agency emerges. Where traditional notions of learning position the learner as a passive agent of reception, the aporia/ epiphany structure of play makes the agency of the player central to the learning process. How one arrives at the epiphany is always a matter of the tacit. The ability to organize and make sense of things is a kind of “attending to” characteristic of the tacit dimension.

The value of play is never found in a static endpoint, but instead in the sense that the player is always in a state of becoming. Whatever it is that one accomplishes in play, it is never about achieving a particular goal (even if a game may have an endpoint or end state). It is always about finding the next challenge or becoming more fully immersed in a state of play. What we do in play may best express the sense of becoming. This sense of play then provides us with a third, and very different, sense of learning. One which is neither about the process of learning to be, or an embodied sense of indwelling (though it may be consonant with either or both), but which is structurally different in how it organizes our understanding and comprehension of the world. In play, learning is not driven by a logical calculus but, instead, by a more lateral, imaginative thinking and feeling. In sum, playing, like making and knowing, derives its power from the tacit dimension.

*Homo narrans*: is “(Hu)man as story teller,”

John Niles, in his book ‘Homo Narrans: the poetics and anthropology of oral literature’, developed the concept of man the story teller and highlighted the importance of this creative act to being human.

Through story telling an unexceptional biological species has become a much more interesting thing, homo narrans: that hominid who has not only succeeded in negotiating the world of nature, finding enough food and shelter to survive, but also has learned to inhabit mental worlds that pertain to times that are not present and places that are the stuff of dreams. It is through such symbolic mental activities that people have gained the ability to create themselves as human beings and thereby transform the world of nature into shapes that were not known before (Niles 1999:3).

Richard Bauman (1986) argues that oral narrative is constitutive of social life itself.

When one looks at the social practices by which social life is accomplished one finds – with surprising frequency – people telling stories to each other, as a means of giving cognitive and emotional coherence to experience; constructing and negotiating social identity; investing the experiential landscape with moral significance in a way that can be brought to bear on human behaviour; generating, interpreting and transforming the work experience, and a host of other reasons. Narrative here is not merely the reflection of human culture, or the external charter of social institutions, or the cognitive arena for sorting out the logic of cultural codes, but is constitutive of social life in the act of story telling (Bauman 1986: 113-14).

So the ability to communicate through the telling of stories and to learn by listening to and extracting meaning from the stories of others would also seem to be important in learning for and being in a complex world<sup>3</sup>.

*Homo curiosus* is “(Hu)man as enquirer”

Human beings are driven by a need to understand. Many situations (challenges, problems, opportunities) trigger a state of perplexity (aporia) or possibility and there is something in human beings that is both disturbed and aroused by this state. We need to comprehend and understand and this need triggers our will to find out by engaging in enquiry. John Dewey considered this process to be ‘the controlled or directed transformation of an indeterminate situation into one that is so determinate in its

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<sup>3</sup> This seminar given by Dave Snowden emphasises the importance of man as story teller in a complex modern world and the literacies and technology needed to make sense of stories and fragments of story ‘From Induction to Abduction: a new approach to research and productive enquiry <http://learningtobeprofessional.pbworks.com/From-induction-to-abduction%2C-a-new-approach-to-research-and-productive-inquiry>

constituent distinctions and relations as to convert the elements of the original situation into a unified whole.’ The idea of ‘productive inquiry’ (Dewey 1922 discussed by Cook and Brown 1999) lies at the heart of our symbolic learning for a complex world representation (Figure 2). The ability to pose and form good questions to find things out in order to make good decisions about what to do, is an essential capability to be developed if we are to help learners become integrative thinkers and doers in a complex world.

Productive inquiry is another unifying concept for integrative learning because it can be applied to all situations : from scientific investigations to situations that crop up in our daily lives. It is a capability we need in all working contexts. ‘Productive inquiry is not a haphazard, random search; it is informed or disciplined by the use of theories, rules of thumb, concepts and the like. These tools for learning are what Dewey understands the term knowledge to mean and using knowledge in this way is an example of that form of knowing which Dewey called productive inquiry’ (Cook and Brown 1999:62).

## **New forms of participatory culture and new media**

The informational world has added its own complexity. Indeed one of the main reasons the world has become so complex is the volume, immediacy, availability, diversity and speed of producing and using information. New media literacies are a set of cultural competencies and social skills that people need in the new media landscape. The mastery and practices of such literacies opens up new opportunities for creativity.

The utilisation of new media in a strong social context has given rise to what Jenkins et al (2006) describe as a *participatory culture* with ‘relatively low barriers to artistic expression and civic engagement, strong support for creating and sharing one’s creations, and some type of informal mentorship whereby what is known by the most experienced is passed along to novices. A participatory culture is also one in which members believe their contributions matter, and feel some degree of social connection with one another (at the least they care what other people think about what they have created). Forms of participatory culture include:

- *Affiliations* — memberships, formal and informal, in online communities centred around various forms of media, such as Friendster, Facebook, message boards, metagaming, game clans, or MySpace).
- *Expressions* — producing new creative forms, such as digital sampling, skinning and modding, fan videomaking, fan fiction writing, zines, mash-ups.
- *Collaborative problem-solving* — working together in teams, formal and informal, to complete tasks and develop new knowledge such as through *Wikipedia*, alternative reality gaming, spoiling.
- *Circulations* — Shaping the flow of media (such as podcasting, blogging).

Participatory culture shifts the focus of literacy from one of individual expression to community involvement. The new literacies almost all involve social skills developed through collaboration and networking. These skills build on the foundation of traditional literacy, research skills, technical skills, and critical analysis skills taught in the classroom. They include (Jenkins et al 2006):

- *Play* — the capacity to experiment with one’s surroundings as a form of problem-solving
- *Performance* — the ability to adopt alternative identities for the purpose of improvisation and discovery
- *Simulation* — the ability to interpret and construct dynamic models of real-world processes
- *Appropriation* — the ability to meaningfully sample and remix media content
- *Multitasking* — the ability to scan one’s environment and shift focus as needed to salient details.
- *Distributed cognition* — the ability to interact meaningfully with tools that expand mental capacities
- *Collective intelligence* — the ability to pool knowledge and compare notes with others toward a common goal
- *Judgment* — the ability to evaluate the reliability and credibility of different information sources
- *Transmedia navigation* — the ability to follow the flow of stories and information across multiple modalities
- *Networking* — the ability to search for, synthesize, and disseminate information
- *Negotiation* — the ability to travel across diverse communities, discerning and respecting multiple perspectives, and grasping and following alternative norms.

In an important ethnographic study Ito et al (2008) constructed a typology of practices describing young people’s participation in the social communities that are created around some forms of new media – which they defined as “hanging out,” “messing around,” and “geeking out.” Thomson and Seeley Brown (2009 ) believe that these three practices frame a (potential) progression of learning that is endemic to digital networks with each level of participation producing a richer sense of learning. They argue –

*Knowing: Hanging Out:* At the most basic level, participation in digital environments requires a sense of *knowing*, of “learning to be.” As Ito argues, “participation in social network sites like MySpace, Facebook and Bebo (among others) as well as instant and text messaging, young people are constructing new social norms and forms of media literacy in networked public culture that reflect the enhanced role of media in young people’s lives.” Digital networked environments provide not only an extension of real-world interaction; they provide an enhanced environment for sharing information and engaging in meaningful social interaction. This notion of hanging out is what we see as the beginning of and essential to the process of indwelling. But the notion of indwelling, as Polanyi makes clear is much richer than simply having a feeling of presence or belonging. It goes beyond the process of enculturation and understanding of social norms, roles, and mores. The beginnings of indwelling in the digital world are rooted in the notion of “being with.” What the Ito et al study reveals is that hanging out is more than simply gaining familiarity with the tools, spaces, and affordances of the digital. In fact, it is probably not an exaggeration to say it is not about the digital at all. Hanging out is about learning how to be with others in spaces which are mediated by digital technology. Again, in this notion we find learning that applies to the digital world, but which is also building a foundation for learning that transcends the bounds of the virtual. Hanging out, we contend, begins to develop the first aspect of indwelling: experience. That experience is governed by a central question: What is my relationship to others?

*Playing/Knowing: Messing Around :* The second notion of participation explored by Ito et al is messing around: “When messing around, young people begin to take an interest in and focus on the workings and content of the technology and media itself, tinkering, exploring, and extending their understanding.” Within this framework, we begin to see a second dimension emerge, one which not only engages a second frame of reference, playing, but which begins to bring the two frames of reference into contact with one another. The function of play, above all else, is to problematize the familiar....For some users in digital environments, hanging out leads to the next stage which is characterized as “open ended,” “self-taught,” and “loosely goal directed.” That moment causes a shift in perspective, where the process of knowing is no longer about our relationship to others, but instead becomes about understanding our relationship to the environment.

What we see as critical in this second stage is the shift in agency that occurs. Where hanging out is about acquiring a sense of social agency, figuring out how to use technology to maintain or enhance social relationships, messing around is about the user’s relationship with the technology or environment itself. In hanging out, that relationship is easy to assess. Digital media are tools to facilitate social interaction. Their function is purely instrumental. The transition to messing around, as Ito describes it, is typically personal and involves the development of a sense of personal agency: “what is characteristic of these initial forays into messing around is that youth are pursuing topics of personal interest. In our interviews with young people who were active digital media creators or deeply involved in other interest-driven groups, they generally described a moment when they took a personal interest in a topic and pursued it in a self-directed way.”

This process, we would describe as moving from experience to embodiment, where the personal investment in digital media changes the focus from social agency to personal agency. Technology and digital media begin to be viewed as an extension of the self. Not surprisingly, most of the introductions to messing around involve things that are heavily connected to personal identity, such as personal videos and pictures, MySpace profiles, and gaming activity that is about player modification.

What messing around reveals most fundamentally is that the relationship between us and our environment is rich, complex and changing. Our process of knowing is no longer instrumental; it is instead structured by a sense of play. As a result, understanding our relationship to our environment requires experimentation, play, and riddling. That subtle shift transforms our experience into a set of tools for understanding the environment.

Playing serves as a frame of reference to problematize the familiar and the “play” we have in our own experience invites us to think through the possibilities of altering, shifting, and experimenting with the things we know as ready-at-hand. The kind of tinkering that characterizes messing around is not instrumental, it is not intended to find solutions or make things work better. It is, instead, focused on helping us understand who we are in relationship to our environment.

Messing around constitutes the next step of indwelling: embodiment. In doing so, it asks the question: What is my relationship to the environment?

*Playing/Knowing/Making: Geeking Out:* The final stage of participation, “geeking out,” is the most complicated. Within our framework, there are two aspects of “geeking out” that merit particular attention. First, the conditions under which geeking out occurs, the technological infrastructure that makes it possible: “For many young people, the ability to engage with media and technology in an intense, autonomous, and interest-driven way is a unique feature of the media environment of our current



historical moment. Particularly for kids with newer technology and high-speed Internet access at home, the Internet can provide access to an immense amount of information related to their particular interests, and can support various forms of geeking out.”

Second, and the most critical aspect of geeking out is the manner in which it extends both the social agency of hanging out and the personal agency of messing around: “Geeking out involves learning to navigate esoteric domains of knowledge and practice, and participating in communities that traffic in these forms of expertise.” It is the richness of experience and social agency produced by hanging out, the sense of embodiment and personal agency created by messing around combined with the third frame of reference, *making*, that produces what we think is the ultimate goal of indwelling: learning. Geeking out provides an experiential, embodied sense of learning within a rich social context of peer interaction, feedback, and knowledge construction enabled by a technological infrastructure that promotes “intense, autonomous, interest driven” learning [and production].

It is the third frame of reference, the making, which values understanding joint work, including the ways in which the community functions of hanging out and the personal functions of messing around can be harnessed and compounded to produce the “specialized knowledge networks” and “Internet-base communities and organizations.” The learning taking place at the nexus of knowing, enquiring, making and playing is radically different from any learning environment seen before. It is an environment that emerges from a sense of indwelling, embodiment and agency. As a result, it is a learning environment that gains almost all of its power and benefits from the tacit dimension.

A growing body of scholarship (Jenkins et al 2006) suggests potential benefits of these forms of participatory culture, including opportunities for learning about learning (as outlined above), a changed attitude toward intellectual property, the diversification of cultural expression, the development of skills valued in the modern workplace, and a more empowered conception of citizenship. Access to this participatory culture functions as a new form of the hidden curriculum offering competitive advantage to those who are able to experience it.

## Dealing with and creating situations

We apply all these forms of being human to the situations we encounter or create for ourselves. It is in the act of assessing and responding to (performing in) situations where our creativity is expressed. At the heart of our epistemological questions and strategies we learn and deploy to find out things so that we can make better decisions about what we need to do and then go

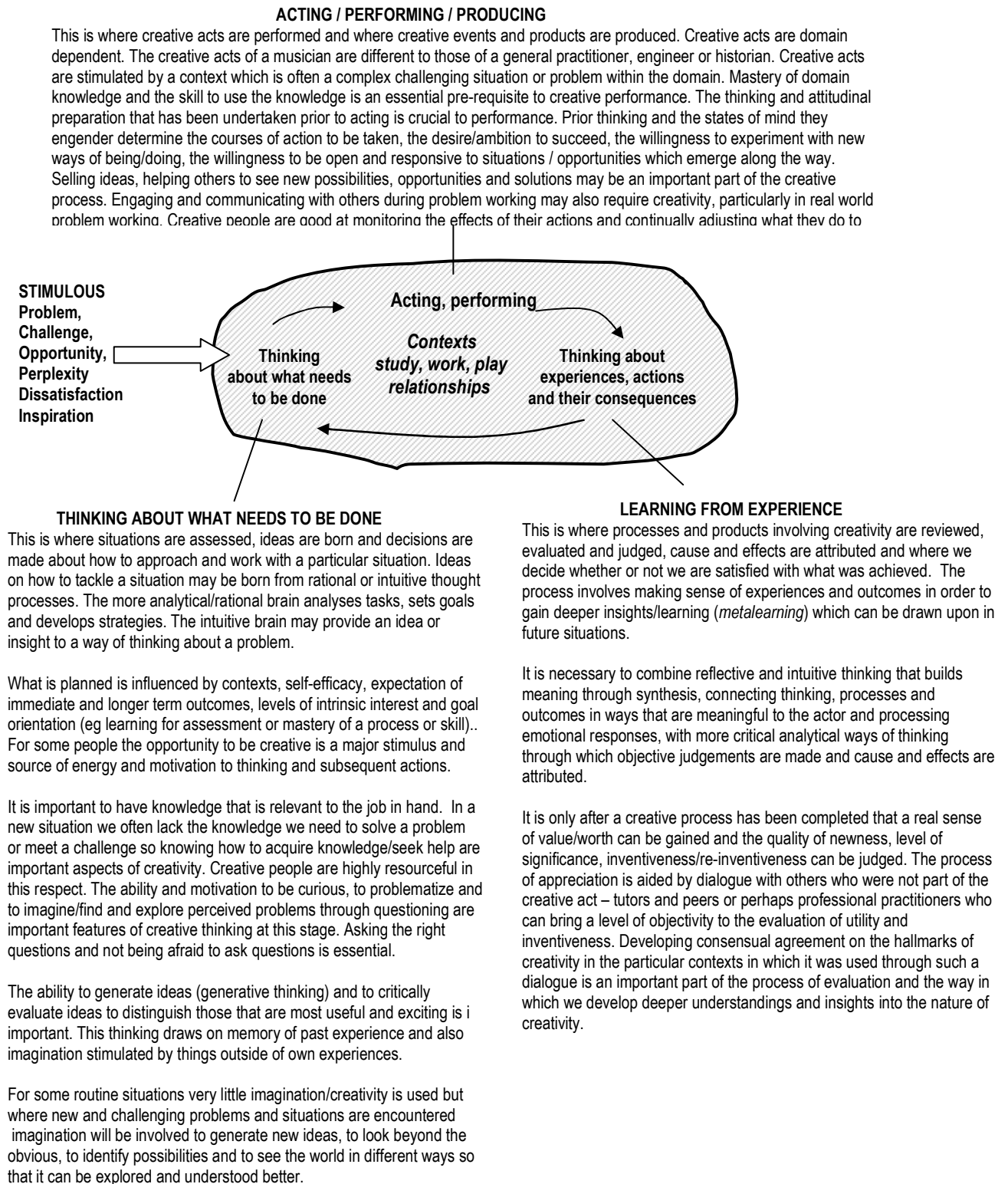
and do it, all the time being aware of the effects of our actions and afterwards reflecting on our performance with the need to learn from our experience of dealing with that situation.

This process is fundamentally a process of self-regulation as described by Schunk and Zimmerman (1998), Zimmerman (2000). Self-regulation can be represented as a continuous process involving forethought (planning and decision making) – performance – self-reflection on performance operating within a context specific environment that is structured by the learner to provide resources to enable them to achieve what it is they want to achieve (Figure 5). Self-regulation provides an explanation for the way learners acquire knowledge and make it their own and integrate their learning through the diverse experiences that make up their lives. This theory of learning connects and integrates thinking about, doing, being and becoming

Concepts of self-regulation developed through empirical studies of students engaged in learning can be directly related to the processes through which professionals develop knowledge and learn through work. Michael Eraut (Eraut 2007, 2009a) defines the basic epistemology of practice in professional work situations as:

- *Assessing situations* (sometimes briefly, sometimes involving a long process of *investigation and enquiry*) and continuing to monitor the situation;
- *Deciding what, if any, action to take*, both immediately and over a longer period (either on one's own or as a leader or member of a team); [ In complex situations this stage also includes *Designing (planning) the action*];
- *Pursuing an agreed course of action*, performing professional actions – evaluating the effects of actions and the environment and adapting as and when necessary;
- *Metacognitive monitoring of oneself*, people needing attention and the general progress of the case, problem, project or situation; and sometimes also learning through reflection on the experience (knowledge building and using) process is the assessment of situations, recognition of problems, challenges and opportunities.

**Figure 5 Ways in which personal creativity might be involved in dealing with and creating situations**  
(based on the model of self-regulation proposed by Schunk and Zimmerman 1998, Zimmerman 2000)



This basic epistemology used by professionals to evaluate a situation – decide how to respond – do something and change what they do when they see and understand its effect – is also the basic epistemology we use in other areas of our lives where the onus is on us to decide what to do and act. Higher education recognizes the importance of this set of interconnected processes for being an effective learner and it has introduced personal development planning<sup>4</sup> to encourage the systematic development of practice.

**Table 1 Typology of Learning Trajectories (Eraut 2007, 2009)**

<p><b>Task Performance</b>  Speed and fluency  Complexity of tasks and problems  Range of skills required  Communication with a wide range of people  Collaborative work</p> <p><b>Awareness and Understanding</b>  Other people: colleagues, customers, managers, etc.  Contexts and situations  One's own organization  Problems and risks  Priorities and strategic issues  Value issues</p> <p><b>Personal Development</b>  Self evaluation  Self management  Handling emotions  Building and sustaining relationships  Disposition to attend to other perspectives  Disposition to consult and work with others  Disposition to learn and improve one's practice  Accessing relevant knowledge and expertise  Ability to learn from experience</p> <p><b>Teamwork</b>  Collaborative work  Facilitating social relations  Joint planning and problem solving  Ability to engage in and promote mutual learning</p>	<p><b>Role Performance</b>  Prioritisation  Range of responsibility  Supporting other people's learning  Leadership  Accountability  Supervisory role  Delegation  Handling ethical issues  Coping with unexpected problems  Crisis management  Keeping up-to-date</p> <p><b>Academic Knowledge and Skills</b>  Use of evidence and argument  Accessing formal knowledge  Research-based practice  Theoretical thinking  Knowing what you might need to know  Using knowledge resources (human, paper-based, electronic)  Learning how to use relevant theory  (in a range of practical situations)</p> <p><b>Decision Making and Problem Solving</b>  When to seek expert help  Dealing with complexity  Group decision making  Problem analysis  Formulating and evaluating options  Managing the process within an appropriate timescale  Decision making under pressure</p> <p><b>Judgement</b>  Quality of performance, output and outcomes  Priorities  Value issues  Levels of risk</p>
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### **So where does personal creativity fit within this fundamental process of situational thinking and action?**

We are all immersed sequentially and simultaneously in a continuous flow of situations<sup>5</sup>, many of which are connected through the intention or will to achieve a goal that is meaningful and worthwhile to us.

<sup>4</sup> QAA Guidelines <http://www.qaa.ac.uk/academicinfrastructure/progressfiles/guidelines/pdp/>

<sup>5</sup> A situation is the combination of circumstances in which you find yourself in, or place yourself into. Writing and reading this article are situations.

Stephenson defines capability 'as an integration of confidence in one's own knowledge, skills, self-esteem and values.... Capability depends much more on our confidence to effectively use and develop our skills in complex and changing circumstances than on our mere possession of those skills.'

Being able to engage with a situation and then follow through with appropriate actions requires capability, defined by Michael Eraut in terms of "what individual persons bring to situations that enables them to think, interact and perform" (Eraut 1997, 1998), and "it is everything that a person (or group or organisation) can think or do" (Eraut 2009a:6). In his research into how professionals learn through work, Eraut identified over 50 dimensions of professional capability which he called learning trajectories. At any point in time professionals are either developing or regressing within a particular trajectory depending on the experiences they are gaining through their work (Table 1). This is an important point we cannot improve our capability for the modern world unless we develop the capability and willingness to learn and keep on learning as our needs and interests demand. Underpinning the idea of learning for a complex world is this capacity and wilfulness to develop ourselves to fulfil the multiplicity of roles and identities we assume in life.

Personal creativity is part of an individual's capability to deal with situations although they may not be conscious of how it contributes in a particular situation. This is why experts often have difficulty in recognising their own creativity – it is totally integrated into their overall capability.

In dealing with situations we may utilise all the forms of knowledge and knowing, and the behaviors and practices of enquiring, constructing, playing and narrating described earlier in this paper. Some or many of these things will be involved in personal acts of creativity that are an individual's response to a specific situation. It is not surprising that someone's creativity is difficult to understand when we have no understanding of the situations in which it happened. Figure 3 outlines some of the ways in which personal creativity might feature in the way we deal with situations.

The complexity of creativity is a confounding issue for teachers who are often deeply perplexed by the whole idea of developing practice to support students' creative development. What exactly is it they are trying to develop? Most would not argue with the complex capabilities of highly effective people proposed by Richard Greene but would question whether higher education alone could develop such capability.

## Importance of resilience in a disruptive world

But we all know that we do not always make the right decision about what to do and even if we do make the right decision other things that we do not anticipate might interfere with our plans and actions. We also have to learn that situations that do not result in a good outcome provide important lessons for learning and future action. Indeed these sorts of experiences often provide the richest learning experiences for us because they highlight the short comings of our own ability to think pr sense with the complexity necessary for the situation.

And life is full of twists and turns and having the will to overcome adversity is fundamental to being resilient in a world of continuous and rapid change: just look at the disruption to people's lives caused by the current economic situation. Hall (2010) explores the idea of a curriculum for resilience and argues that a lifewide curriculum offers more possibility of helping learners recognize and develop their agency to be resilient in a disruptive world.

Resilience is socially- and environmentally-situated, and denotes the ability of *individuals* and *communities* to learn and adapt, to mitigate risks, prepare for solutions to problems, respond to risks that are realized, and to recover from dislocations (Hopkins, 2009). For Hopkins (2009), resilience is "the capacity of a system to absorb disturbance and reorganize while undergoing change, so as to retain essentially the same function, structure, identity and feedbacks". This focuses upon defining problems and framing solutions contextually, around our abilities to develop adaptability to work virally and in ways that are open source and self-reliant, rather than reliant on third parties. Resilience is, therefore, more important than sustainability, in enabling communities to manage shock, disruption or vulnerability, and to find alternatives. This means working at appropriate scale to take collective action.

There are particular situations that people encounter, known as immersive experiences (Jackson and Campbell, 2010 and <http://immersiveexperience.pbworks.com/> ), which are particularly favourable to the development of personal resilience (and many other valuable qualities and dispositions) for dealing with complexity and even chaos (see next section). These are complex challenging situations, involving many discrete situations over time,

- require an intense level of physical, intellectual and emotional engagement and lots of concentration and energy
- are extremely challenging, sometimes difficult to describe in ways that capture the complexity, in which high risk is often associated
- are uncomfortable or frightening where people do not feel in control
- involve states of perplexity, uncertainty and a diminished confidence
- are unknown and require active and energetic exploration
- engender feelings of deficiency and inadequacy but provide opportunity for mastery and personal transformation
- provide opportunity for the considerable development of new capability
- invite personal creativity
- stimulate and require reflection and discovery of self

Four different types of immersive experience were distinguished in the accounts of people describing such situations (Jackson and Campbell 2010):

- 1) Experiences that are essentially pleasurable that have little or no risk – like being immersed in a book.
- 2) Experiences that contain physically, intellectually and emotionally challenging, stressful or distressing situations. Situations may be entered voluntarily or a person may find themselves unintentionally in the situation. Outcomes from such experiences may not always be positive but if the situation can be mastered they are often transformational and positive in their effects.
- 3) Experiences that are intended to 'block out the light' rather than lead to enlightenment the murky side of immersive experience. Situations may be entered voluntarily or a person may find themselves unintentionally in the situation Here immersion has 'links' with homogenisation, 'brain-washing' and the repression of difference and outcomes are not generally positive or beneficial but they are likely to be transformational in their effects.
- 4) Experiences that are painful and distressing, like serious illness or bereavement that people find themselves in rather than put themselves voluntarily into. They are dominated by emotional low points and outcomes are not generally positive or beneficial but they are likely to be transforming in their effects.





out on the other side of such an experience is very different from the one that went into the experience and their capability and confidence to deal with future situations of similar demand, risk and uncertainty is greatly enhanced. Such situations are difficult to engineer and it is unethical to put students into situations that are so stressful and challenging so a fundamental question for higher education curriculum designers is – *if developing resilience to deal with these sorts of situations is so necessary what forms of experience nurture the spirit that will enable learners to develop the will and capability to overcome the considerable challenges that many will experience in their professional and personal lives?*

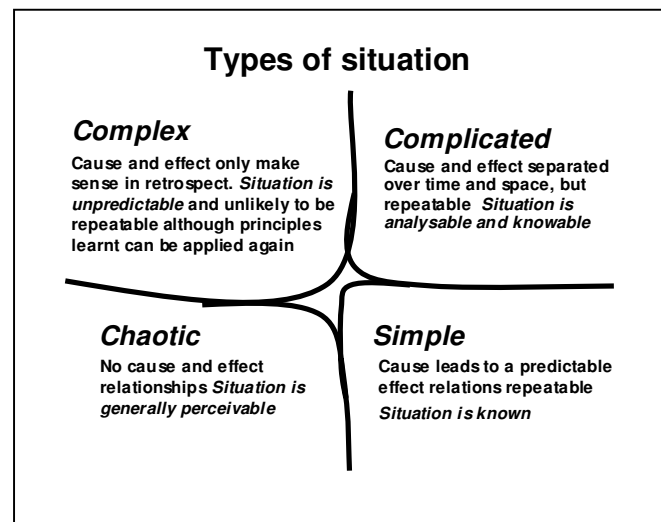
## Thinking about different types of situation

The human condition is to try to understand situations in order to make good decisions about how to act (or not act). Some situations are easy to comprehend, they are familiar and we have dealt with them or something like them before and we are confident we know what to do. Others are more difficult to understand and some are impossible to understand until you have engaged in them. The Cynefin (Kinefin) framework (Figure 5) developed by Dave Snowden (Snowden 2000, Snowden and Boone 2007) helps us appreciate different types of situation. It was originally developed to describe and help understand situations and how to deal with them in organisations, but the concepts in the tool can be used for any situation. There are four domains within the framework. These domains describe how things happen in different situations.

In the *simple* domain things have a simple cause and effect – you do X and you are very likely to get Y. The environment is familiar and understood. You will probably have had many similar experiences that can be directly relate to the situation. A cause, for example 'what you do', will lead to a predictable effect. And if you did the same thing in a similar situation the result will be repeatable. At the other extreme is *chaos*. In the chaotic domain there is no perceivable relationship between cause and effect. If this situation happens in your life you feel totally out of control and totally overwhelmed.

Between these two extremes there are two other types of situation that require us to think and behave in different ways. In these situations our natural response is to act, sense what happens and then act again until we get ourselves into a more stable situation.

Figure 7 The Cynefin tool<sup>6</sup> to facilitate thinking about situations of differing complexity (Snowden 2000)



*Complicated* situations are more difficult to understand. They are not single momentary situations but involve a stream of interconnected situations (many of which may be simple) linked to achieving a goal (like solving a difficult problem or bringing about a significant innovation or corporate performance). There are cause and effect relationships but you have to put some

<sup>6</sup> <http://en.wikipedia.org/wiki/Cynefin> and excellent video clip by Shawn Callaghan <http://learningtobeprofessional.pbworks.com/From-induction-to-abduction%2C-a-new-approach-to-research-and-productive-inquiry>

effort into working out the relationship by gathering information about the situation and analysing it to see the patterns and look for possible explanations of what is happening or potential solutions to problems. Engaging in these sorts of challenges is the way you become more expert in achieving difficult things.

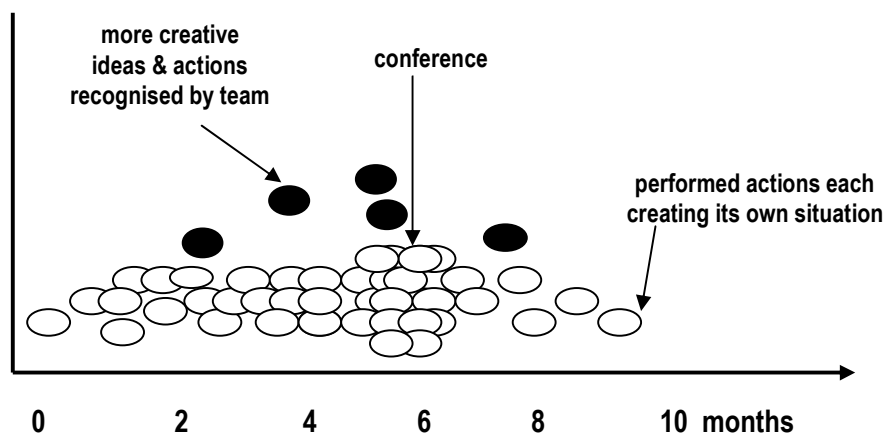
*Complex* situations are even more difficult to understand. They are not single momentary situations but involve a stream of interconnected situations (many of which may be simple) linked to achieving a significant change in the pattern of beliefs and behaviours (culture) in a society or organisation. In such situations the cause and effect relationship is so intertwined that things only make sense in hindsight and sometimes well after the events have taken place. In the complex space its all about the inter-connectivity of people and their evolving behaviours and patterns of participation that are being encouraged or nurtured through the actions of key agents.

The results of action will be unique to the particular situation and cannot be directly repeated. In these situations relationships are non-linear and things are unpredictable in detail. People involved may not know the cause of the change that they have been involved in or ascribe the source of change to something that is quite removed from the trigger for change. The sort of things you are dealing with in the complex space are things like culture, trust, leadership and the way you make progress in understanding what is happening is to sense the patterns of change and respond accordingly.

### How might the encouragement and demand for creativity relate to these different types of situation?

To illustrate how creativity might be related to these different situational scenarios I provide two examples from my own professional experience. The first (schematically depicted in Figure 8), is a conference organized by SCEPTRe in April 2010. Organising a conference that engages people from across the higher education system is a *complicated challenge* involving strategic planning formed around a vision of the overarching goal and hundreds of discrete interventions and interactions. Many of these interactions are simple and straight forward i.e. there will be a simple relationship between a cause and effect, but there will be lower levels of certainty about many other actions and understanding their effects, particularly when many actions are interfering with each other, is dependent on gathering information to permit an analysis of the overall situation. Achieving this overall complicated outcome is a team effort (we had a core team of six people but the conference itself involved contributions from over 70 individuals). Within the overall process the team itself recognizes that there were a small number of particularly creative acts but the real act of creativity is in the overall performance that created a conference which achieved its goals of connecting and drawing together a large number of people to pool their knowledge and experience and explore an emergent phenomenon in higher education.

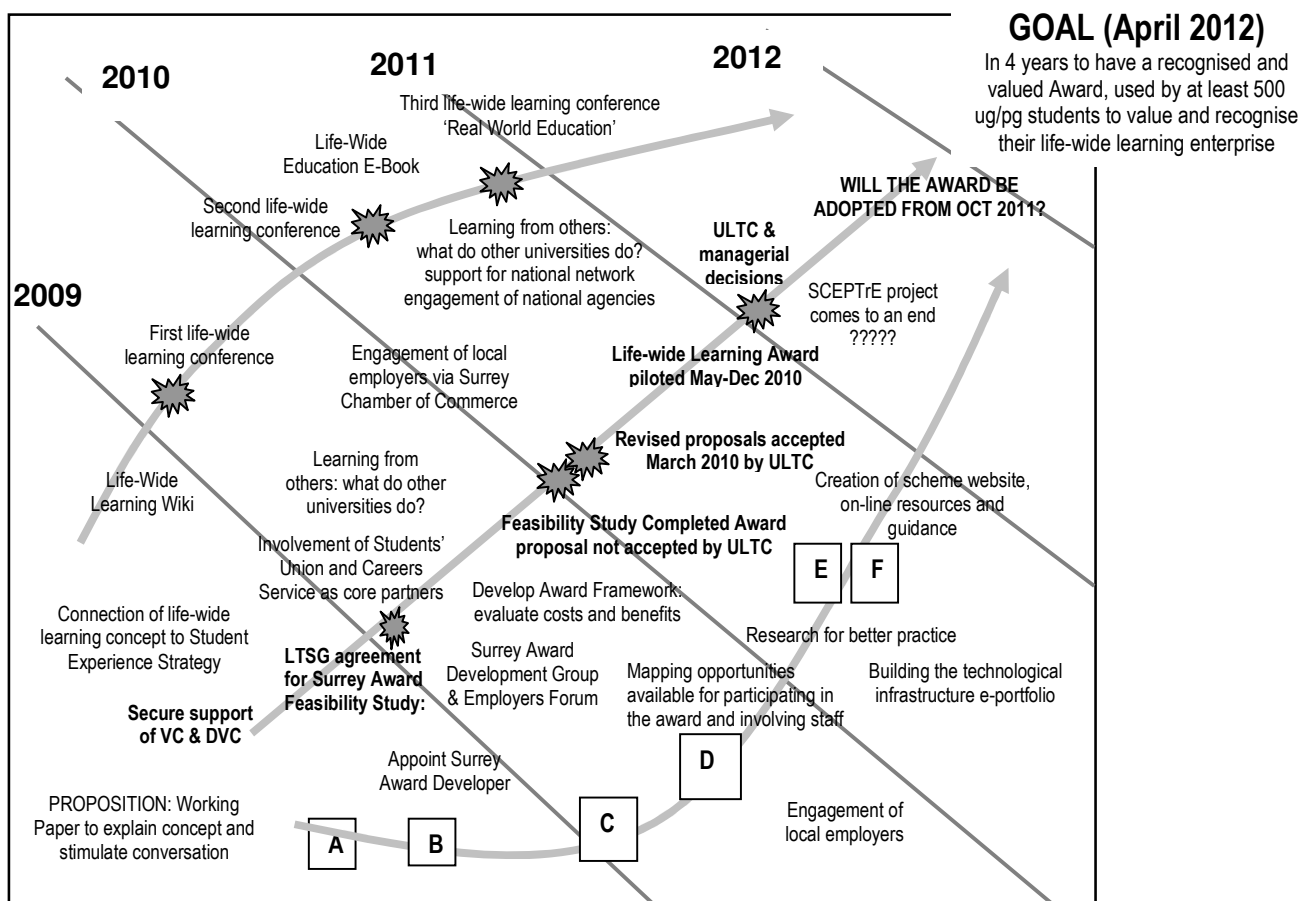
**Figure 8 Graphic to illustrate a complicated challenge (organizing and delivering a national conference) involving a work team in many hundreds of interactive situations and planned/unplanned interventions.**



The second illustration (Figure 9) maps a complex challenge namely SCEPTRe's attempt to change the university's conception of curriculum and gain recognition, through an award, for the informal learning and personal development gained by students through experiences that are additional to the academic curriculum. The figure illuminates a sustained enterprise over several

years in which a small team of people (typically 6) and their champions have engaged hundreds of people in thinking and actions as they create or participate in situations that are ultimately linked to achieving their goal.

**Figure 9 Map of a complex organisational change process that SCEPTrE is brokering and facilitating**



'In highly complex intervention scenarios, it is usual to begin with determining 'the outcomes' to be evaluated for impact, and working backwards to map the processes involved in securing these outcomes. However, this assumes: 1) that there is a bounded intervention with a clear beginning and clear end, 2) that the outcomes are traceable from the intervention, and in relation to what impact and for whom, and 3) that there are ultimate/final outcomes. Regarding the first assumption, the intervention is constituted of various people, activities and practices, all of which have evolved and changed over the course of the evaluation period. There is thus not ONE bounded intervention but a dynamic complex of interventions, at both a macro and a micro-level. Moreover, the 'domain of impact' has also changed dramatically across the evaluation period, because of two large scale restructuring exercises involving staff reshuffles and departures. Thus both 'the intervention' and

the 'domain of impact' have, and are continuing to change in a multivariate and multi-layered way.' *SCEPTrE Evaluation Report March 2010*.

The process of attempting to influence and support organizational change has been described elsewhere (Jackson 2010 in press) so I will use a quote by Ed Catmull President of Walt Disney Animation Studios and Pixar Animation Studios, to convey how I believe creativity featured in our everyday working practices.

'The initial idea for the movie—what people in the movie business call “the high concept”—is merely one step in a long, arduous process that takes four to five years..... A movie contains literally tens of thousands of ideas. They're in the form of every sentence; in the performance of each line; in the design of characters, sets, and backgrounds; in the locations of the camera; in the colours, the lighting, the pacing. The director and the other creative leaders of a production do not come up with all the ideas on their own; rather, every single member of the 200- to 250-person production group makes suggestions. Creativity must be present at every level of every artistic and technical part of the organization. The leaders sort through a mass of ideas to find the ones that fit into a coherent whole—that support the story—which is a very difficult task. It's like an archaeological dig where you don't know what you're looking for or whether you will even find anything. The process is downright scary.' (Catmull 2008)

This quote captures very well the sense of enterprise and purpose within which individual capabilities (including creativity) are collectively applied to accomplish a significant goal in the work environment. He also expresses very well where my sense of where creativity lies the 'in form of every sentence' idea and but it is the way that the sentences combine to form the script and the way in which the script is performed through which organisations become different (I am reluctant to use transformed). The scale, levels and means of engagement, multiplicity of goals, high ambition and length of time that goals have been prosecuted within an ever changing work environment, means that SCEPTrE's strategic project lies in the complexity field and is best viewed in terms of the principles of 'emergence' (Seel 2006).

Looking back the educational vision – *learning for a complex world*, which was negotiated with the university at the start of the project – provided SCEPTrE with the possibility space to enable what has happened to happen. It would have been much more difficult to work in an open ended way had we been constrained by more concrete objective. Within the thousands of everyday situations involving the project team, whether at the scale of an email or conversation or a major event, individual and collective creativity will have been involved over and over again in processes of imagining, designing, inventing, adapting, communicating, persuading, negotiating, problem solving, opportunity seizing... and in many other ways. I am certain of this because 'The desire to do something because you find it deeply satisfying and personally challenging inspires the highest levels of creativity' (Amabile 2008).

Working with complicated and complex situations requires not only a desire and commitment to do something but the spirit of adventure to engage with uncertainty. Andriopoulos and Lowe (2000) use the term 'adventuring' to describe the process through which individuals and collaborative enterprises explore and come to understand and exploit uncertainty. They recognise three categories of adventuring, all of which are relevant to complex situations, namely, introspecting, scenario-making and experimenting.

*Introspecting* is when people explore uncertainty from what is already known. Those that wish to adventure within a field need to have the basic knowledge of their specific field. At the highest levels, if you want to change a domain you need to know what already exists in the domain. In the sort of situation described above this would include knowledge of the organisation, knowledge of the educational field and its practices and knowledge of what other institutions are doing.

*Scenario making* refers to the development of possible routes to tackle a particular situation. Hypothesising, as a way of visualising possible courses of action and their consequences, is a core process. In the situation described above this involved considering the ways in which other institutions are approaching the 'problem' and imagining how it would work at Surrey as well as working out new scenarios based on the types of thinking elaborated in part 1 of this article.

*Experimenting* refers to processes through which possibilities or scenarios are tested and evaluated. Through this process, observations and other sorts of information are synthesised and evaluated. In the situation described above this involved several phases of developing, trialing and evaluating frameworks for learning and its recognition before engaging in a significant pilot exercise.

These process take place both sequentially and consequentially (in the sense that they evolve as a complex situation evolves). Adventuring involves risk-taking and mistake making. Cultures that are averse to risk-taking and penalise mistakes inhibit adventuring and therefore the potential for creativity.

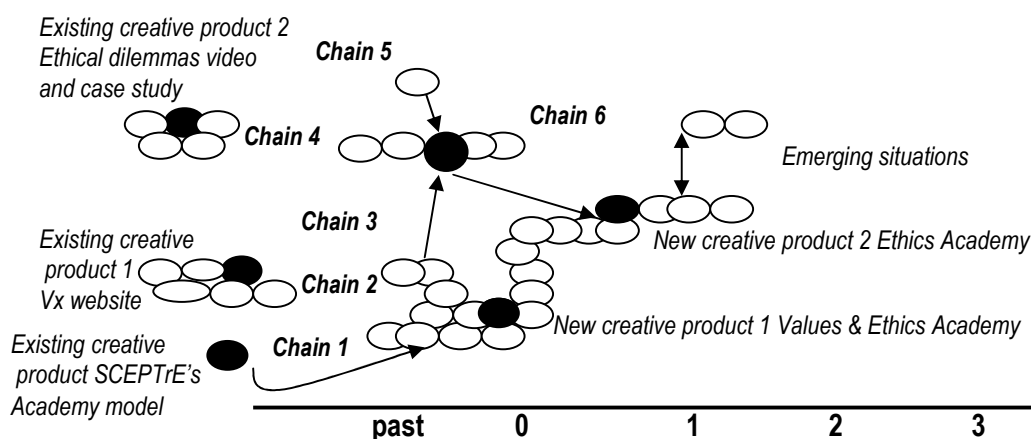
### ‘Chains of situations’ a catalyst for networked and emergent change and creativity

*‘Analogical thinking is central to creativity. The creative person "makes connections" between one situation and another, between the problem at hand and other situations that are relevant.’ (adapted quote from Davis 1993)*

As I was writing this I opened an email (the start of so many situations in my life) from a colleague in another institution and it triggered a thought process that offers another insight into the relationship between creativity and situations. The story is one of emergence in which chains of situations created by different people for their own purposes coalesce and from these interactions new things (processes, products, insights, relationships and outcomes) emerge (Figure 10).

*Chain 1* For SCEPTrE the story starts about 4 months ago. We were fortunate to have working with us a visiting engineering education professor from Australia – who was very interested in values, ethics and social responsibility. Over a number of conversations (situations) we began to think in terms of adapting a generic pedagogic model<sup>7</sup> (the results of many chains of situations in the past) to create a Values and Ethics Academy. <http://valuesandethicsacademy.pbworks.com/> We identified another teacher (DF) who had an interest in this area and he readily agreed to collaborate. The Academy was run in March 2010. Inspired by his experience DF went on to initiate another chain of situations (chain 3).

**Figure 10 Graphic to illustrate my story of ‘chains of situations’ coalescing within a complex emergent organizational change process.** Open ellipses are – situations specific to the work process. Solid ellipses are the creative actions, results (tools, resources and educational designs) and outcomes – new learning for everyone concerned. The net effect has been to adapt, re-purpose and re-use existing resources and create entirely new resources and ways of thinking. Taken as a whole this is creativity in action in the real world.



<sup>7</sup> An Academy is a co-curricular part designed part emergent process consisting of two workshops with a space in between (between 1 – 4 weeks). In the first workshop participants are encouraged to think about and explore the central theme of the Academy (creativity, culture, enterprise, complexity or values and ethics) and then working in small groups they plan an appropriate action – a situation that they engineer. They then go and do it (perform the action) and record usually in digital images or video what happened. In the second workshop they share their experience and evaluate what they have learnt.



*Chain 2* Simultaneously, the Centre was working with a colleague (DS) in New Zealand who has developed a very useful website and interactive tools to facilitate the real time exploration of ethics and values. We were so impressed that we invested in it. <http://www.values-exchange.com/>. These two chains of situations both of which contain the creative products and actions of a number of people coalesced in the Academy.

*Chain 3* DF took what he had learnt through this experience and created an Ethics Academy for final year business students using the VX website.

*Chain 4* A group of teachers in another university developing some excellent video based case study materials around the theme of future proofing graduates. <http://www2.bcu.ac.uk/futureproof>

*Chain 5* I came across an email advertising the materials and after watching a video (ethical dilemmas) I recognised its potential for being used in the Academy and alerted DF who agreed and incorporated it into his design for his Ethics Academy. DS picked up the email exchanges and embedded the video in the Vx website as a case study.

So here we have five situation chains, all containing the creative endeavours of people working together to connect and adapt materials to a new context in order to help students learn (the moral purpose which drives our actions as teachers and educators).

*Chain 6* The email I opened which started this thought trail, was from the teacher who had developed the ethical dilemmas video case study who had met DF at a workshop and was expressing great interest in the fact that his materials had been adapted in this way. He was inviting the other two significant people in this chain of situations to write up the work as a new project. Somehow I don't think that this will be the end of this story.

When I had finished explaining events to myself I sent my story to the participants in these chains of events and invited their perspectives. DS responded by sharing these interesting thoughts and drew my attention to Arthur Koestler's book *The Act of Creation*<sup>8</sup>.

'I constantly have events and connections happen to me that could be described as mere coincidence, or luck, or 'destiny' or some other label. And possibly each of these is true. However, there has to be more to it than this. Having thought about this off and on, I think it is mostly to do with this: *In the fields of observation chance favours only the prepared mind.* (Louis Pasteur). This plus a determination to follow up possibilities, with passion. So - to make something of a chance remark you have to be in a position to understand what it might mean AND you also need to do something about it - change in human society does not just happen, it is always a process which requires action. If you see life as full of millions of streams of potentially meaningful processes and events you can just watch the water flow by or you can begin to discriminate between types of stream, and then step into those you desire. Further than that - you can deliberately see what happens when you combine streams. This can be as simple as combining new colours, or creating new jokes, or as complex as combining scientific fields - sociobiology for example.' (email from Prof David Seedhouse in response to my sharing of this story).

The conclusion I draw from this story is that nestled within complex emergent and largely unplanned change processes are multiple chains of situations created by individuals investing their time, passions, values and capability, which coalesce and new things emerge as new relationships and possibilities are born. And that the acts of creation found in specific situations are wilful (not chance) attempts by self-aware, knowledgeable individuals seeking to influence and make a difference (create new value) by connecting and fusing things that have never been brought together before. The process is not dissimilar to the stages of transfer identified by Eraut (2004b:12) in which relevant knowledge is identified, the new situation is appraised (actually created in our case), and appropriate knowledge identified as relevant is transformed to fit the current situation and integrated with other knowledge, skills (and technology) to fit the current situation and then integrated with other knowledge and skills in order to act in the new situation.

The net effects from this particular evolving story of participation has been to adapt, re-purpose, contextualise and re-use existing resources and create entirely new resources, forms of practice and ways of thinking. Taken as a whole this is creativity

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<sup>8</sup> 'Koestler's basic idea is that the creative act involves "*bisociation*" (not mere association) which happens, if two (or more) apparently incompatible frames of thought ("*matrices*") are brought together by an ingenious mind.<sup>[2]</sup> (Wikipedia [http://en.wikipedia.org/wiki/The\\_Act\\_of\\_Creation](http://en.wikipedia.org/wiki/The_Act_of_Creation))

in action in our real worlds: it is distributed through all the people investing in the process and emerges through the active participation of people who care enough about things they are doing to make new things happen.

### **And this brings us back to the question of will**

The individual learner (you, me, our students, friends and family and everyone else) lies at the heart of our learning for a complex world metaphor and central to the way that we see and engage with the world is our will to make a difference. The actions of the people described above were all driven by the desire to make a positive difference to students' lives.

Through our will we live the person we want to be and become. I agree with Ron Barnett (Barnett 2005:15) '*Will is the most important concept in education. Without the will nothing is possible.*' We cannot achieve anything of significance. We cannot make decisions about a situation we find ourselves in, we cannot act in ways that are ethical and appropriate to the situation and we cannot learn how to deal with the situation or learn from the experience and we cannot strive to be creative without the will to do so.

A fundamental question for higher education curriculum designers is *what forms of experience nurture the spirit that will enable learners to become who they want to become and overcome the considerable challenges that many will experience in their professional and personal lives?* My belief is that, for many people, an academic, discipline-based programme alone cannot provide the answer to this question.

### **Propositions**

A number of propositions emerge from this review of learning and capability for a complex world: capability that includes our creativity. These propositions are used to argue for a lifewide concept of curriculum in part two of this paper.

Firstly, if learners are to motivate themselves to be creative we have to adopt a concept of curriculum that nurtures their spirit and their will to be and become a better more developed person and to create new value in the world around them. Allied to this they must have the freedom to make choices so that they can find deeply satisfying and personally challenging situations that inspire and require their creativity.

Secondly, if we are to prepare learners for the complexities they will undoubtedly encounter in their future lives we must create a curriculum that inspires and enables them to experience and appreciate knowledge and knowing in all its forms and appreciate themselves as knower, maker, player, narrator and enquirer.

Thirdly, we have to enable learners to appreciate the significance of being able to deal with and create situations and develop their capability to deal effectively with situations. Situations are the point at which an individual's creative thinking and their capability to turn new and novel ideas into action is applied. To facilitate students' creative development we therefore need a curriculum that encourages them to create new situations individually and with others, by connecting people and transferring, adapting and integrating ideas, resources and opportunities, in an imaginative, wilful and productive way, to create new value in the world around them.

Such a curriculum must also prepare them for and give them experiences of venturing into uncertain and unfamiliar situations and enable them to encounter and learn to deal with situations that do not always result in success and which require resilience and persistence to overcome difficulties and meet the challenge. It should not penalise 'mistakes' or see the lack of an immediately successful outcome as a failure to achieve but see the process of trying to achieve in such uncertain and difficult territory as a successful achievement in terms of learning for the future.

A curriculum that would facilitate students' creative development for the modern world would enable them to develop the communication skills and literacies that are necessary to be an effective learner and communicator and encourages them to participate in the social communities that are created around some forms of new media.

Grappling with complex changing situations requires us to provide students with the conceptual tools to help them think about and understand change and the experiences of dealing with change as they participate in evolving situations over time. A world that requires you to participate in continuous change and to contribute to change must also engender a commitment to personal

and cooperative learning and the continuing development of capability for the demands of any situation and the more strategic development of capability for future learning.

A summary of the working propositions for a curriculum that would enable students to develop deeper understandings of their own creativity, encourage them to utilise their creativity in the situations that they encounter or create is given in Table 2. If my line of reasoning is accepted then these propositions could be used to evaluate the extent to which a curriculum enables these situations.

**Table 2 Emerging propositions for a curriculum that facilitates development of students' capability (including their creative capability) for the real world outside higher education (Jackson 2010)**

***To facilitate students' creative development for the real world we must create a curriculum that –***

**Proposition 1 :** gives them the freedom and empowers them to make choices so that they can find deeply satisfying and personally challenging situations that inspire and require their creativity. A curriculum should nurture their spirit: their will to be and become a better more developed person and create new value in the world around them

**Proposition 2:** enables them to experience and appreciate knowledge and knowing in all its forms. And enables them to experience and appreciate themselves as knower, maker, player, narrator and enquirer

**Proposition 3 :** enables them to appreciate the significance of being able to deal with situations and to see situations as the fundamental opportunity for being creative. They need to be empowered to create new situations individually and with others by connecting people and transferring, adapting and integrating ideas, resources and opportunities, in an imaginative, wilful and productive way, to solve problems and create new value.

**Proposition 4:** prepares them for and gives them experiences of adventuring in uncertain and unfamiliar situations, through which they encounter and learn to deal with situations that do not always result in success but which do not penalise 'mistakes' or failure to reach a successful outcome

**Proposition 5 :** enables them to develop and practice the repertoire of communication and literacy skills they need to be effective in a modern world

**Proposition 6:** encourages participants to behave ethically and with social responsibility promoting creativity as means of making a difference to people or adding value to the world

**Proposition 7:** engenders a commitment to personal and cooperative learning and the continuing development of capability for the demands of any situation and the more strategic development of capability for future learning

**Proposition 8:** helps them develop and explain their understandings of what creativity means in the situations in which they participate or create, and values and recognises their awareness and application

## PART 2

### Implementing Lifewide Education

#### Introduction

In the first part of this article I developed a number of propositions about the nature of a higher education curriculum that would help students develop their capability, which includes their creativity, for the real world that lies outside formal education. My central argument is that a curriculum that is only based on learning within an institutional environment will not prepare learners adequately for the complexity they will encounter. Only a curriculum that also incorporates the opportunity and support to learn from experiencing the world both inside and outside the institutional environment can achieve this goal. Many universities in the UK recognise this (Rickett 2010) and have developed, or are in the process of developing schemes to value students' informal learning. In the second part of this paper I will show how the University of Surrey has tried to utilise the thinking developed in the first part of this article to implement the idea of lifewide education and create new educational practices through the process outlined in Figure 8.

#### A more complete education

What we do as educators and institutions is only one side of the educational equation. Learners are busy preparing themselves for the rest of their lives. In 2010 Ron Barnett conducted an interview study involving Surrey students and concluded (Barnett 2010:26):

- That the student's learning often takes place in a *number of sites* [not just their academic programme]
- That the student's formal course of study may constitute a *minority* of the learning experiences undergone by a student while he or she is registered for that course of study. (In some courses in the humanities and social sciences, after all, 'contact time' may amount to less than ten hours per week.)
- That much of the learning that a student achieves while at university is currently *unaccredited*, and involves unaccredited learning that is both *within* the course of study and unaccredited learning that is *outside* the course of study (either on or off campus)
- That much of the student's learning is *personally stretching*, whether it is on or off campus, and whether it is part of a formal course of study or not; it may involve situations quite different from anything hitherto experienced (across social class, ethnicity, language, nation, and other forms of social, cultural and economic differentiation)
- That much of the student's experiences outside the course of study is highly demanding, and may involve high degrees of responsibility (perhaps for others) and accountability such that it leads to major forms of personal development on the part of the student.

'All of the students [*interviewed*] were developing their knowledge and their skill sets. For example, the students I interviewed were developing *skills* for managing the many demands on their lives, for juggling the complexities of their lives and in analysing situations to determine how best to be effective; and some of the interviewees were quite explicit about how they were developing such skills. They were also developing their *knowledge* in different ways. So the domains of skill and knowledge remain important in understanding the learning achievements of students in their lifewide learning. However, in addition to developing their *knowledge* and their *skills*, all of my interviewees were developing their *dispositions* and *qualities* as well. And in developing their dispositions and qualities, they were developing as persons. In developing their *dispositions*, they were developing a greater preparedness to go on, to engage with life, and to throw themselves into and to engage with strange situations. In developing their *qualities*, they were developing their own personas, and a way of imparting their own stamp on the activities into which they threw themselves. The totality of the student's learning experiences, we can see, is altering their *being-in-the-world*. This being is not fixed but is now in a process of perpetually becoming as the students engage with a continuing interplay with their environment, moving this way and that, and so unfolding in often unpredictable ways.' (Barnett 2010:28)

In comprehending students' lifewide learning, therefore, we need to supplement the domains of knowledge and skills with a sense of a student's *being* and, indeed, their continuing *becoming*. Here, a language of (a) dispositions and (b) qualities may be helpful. In the quotations above, for example, we can see (a) the *dispositions* of:

- a willingness to learn about oneself
- a preparedness to put oneself into new situations
- a preparedness to be creative in interpersonal situations
- a preparedness to move oneself on, into another place
- a will to help others
- a willingness to adjust one's approach and self-presentation, according to context
- a will to keep going, even in arduous settings

We also see the *qualities* of:

- enthusiasm
- confidence
- empathy
- care (for others)
- energy

## Learning through a lifewide curriculum

These sorts of perspectives on student development were totally consistent with our experiences of what students said about the learning and development they gained from experiences outside formal education.

It encouraged us to think quite differently about the curriculum<sup>9</sup>. It seems self evident that we are who we are because of the way we have lived our lives and the way we currently live our lives and what and how we learn through our experiences holds the potential to become who we want or need to be. *Lifewide learning* (Jackson 2008a) embraces the many sites for being and learning that occur in a learner's life at any point in time. The concept adds value to the well established idea of life-long learning which captures the continuous set of patterns of learning that emerge from personal needs, aspirations, interests and circumstances throughout an individual's life. *Lifewide education* (Barnett 2010) is given meaning and material substance through the intentional designs and actions of an institution or educational provider who seeks to encourage, support, recognize and value learning from all parts of a learner's life.

When designing higher educational experiences we typically begin with provider defined purposes and the outcomes, create a design often around the content, encourage learning through prescribed teaching and learning activities, provide some supporting resources (usually text based) and assess learning against strict criteria that reflect the answers we expect. There is no room for outcomes that are not anticipated or outcomes that learners individually recognise as being valuable to them.

But what if we were to begin with the learner and their life, and see the learner as the designer of an integrated meaningful life experience? An experience that incorporates formal education as one component of a much richer set of experiences that embrace all the forms of learning and achievement that are necessary to sustain a meaningful life. Integration suggests the bringing together of separate entities to make a new and more connected whole. We see study, work and play as separate activities because that is the way our culture sees them. But these experiences are integrated into our life along with all the learning that flows from them and we develop as individuals through the unique combination of experiences that compose our lives.

Working backwards from the learner and their life perspective, I proposed the idea of a *lifewide curriculum* (Jackson 2008a) to address some of the deficiencies of the traditional higher education curriculum, in respect of its ability to nurture students' creative development and spirit.

'A lifewide curriculum honours informal/accidental/by-product learning in learner determined situations as well as formal learning in teacher determined situations. It embraces learning in the physical/emotional social spaces that characterise the work/practice environment and it honours formal and informal learning in all other environments that learners chose to be in because of their interests passions and needs. Because of this a lifewide curriculum is likely to provide a better framework for encouraging, supporting, recognising and valuing learners' creativity and self-expression, than a curriculum that is solely based on academic or academic and professional practice experiences.' (Jackson 2008a).

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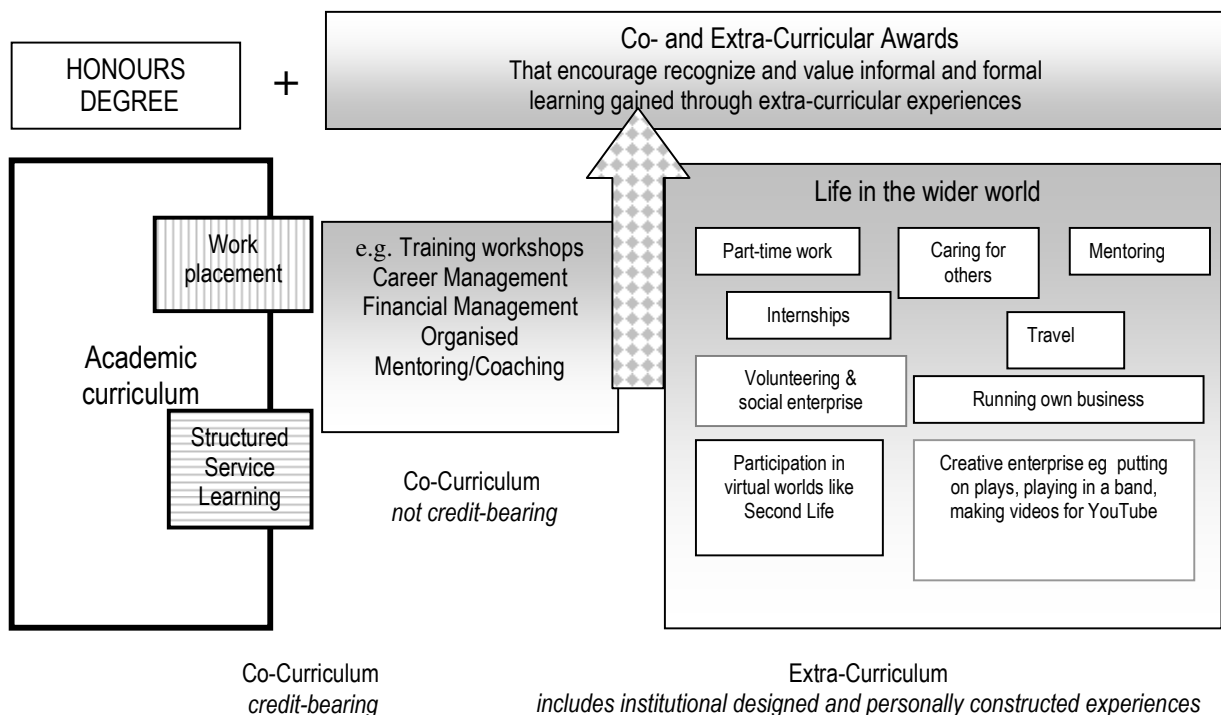
<sup>9</sup> Not just a prescribed course but the course of life: the lived experience



A lifewide curriculum could facilitate students' creative development in three ways:

- 1) In the forms that are necessary to be successful and innovative in the academic disciplinary or interdisciplinary domain. This includes disciplines that are traditionally considered to be creative (eg linked to Creative Arts or Design) and those that are not considered to have a creative basis.
- 2) In the forms that are necessary to be successful and innovative in any professional/work domain. This includes work enterprises that are traditionally considered to be creative (eg linked to Creative Arts or Design) and those that are not considered to have a creative basis.
- 3) In the forms of self-expression that learners chose for themselves in their lives outside the academic and practice curriculum. This domain is particularly rich in affordances and possibility spaces and it is this domain that is currently most difficult to honour and recognise learning and creative enterprise.

**Figure 11 Lifewide curriculum (Jackson 2008b, 2010)**



Since mid 2008 we have tried to turn these ideas and beliefs into new educational practices. The concrete expression of a lifewide curriculum (Figure 11) translates into a curriculum map containing three different curricular domains all of which have the potential (should the learner wish) to be integrated into a learner's personalized higher education experience and be valued and recognized :1) academic curriculum which may by design integrate real world work or community-based experiences; 2) co-curriculum – designed experiences that lie outside the credit-bearing programme which may or may not receive formal recognition for learning; 3) extra-curricular experiences that are determined by the learners themselves.

### Surrey Lifewide Learning Award

The journey portrayed in Figure 9 has not been easy. It has involved several cycles of design, development, experimentation, evaluation and re-design/reframing and many strategies to sell and persuade colleagues and the university to allow us to experiment. The concrete framing of our lifewide learning and lifewide curriculum idea is an Award – 'Surrey Lifewide Learning Award' which has been positioned in terms of supporting the University's first Student Experience Strategy (SES)

published in July 2008. The SES 'Action Plan' charged SCEPTRe with 'Developing the idea of a "life-wide curriculum" as an important part of our understanding of a complete education.' In February 2009 SCEPTRe proposed the idea of an Award to recognise and value learning gained through a life-wide curriculum i.e. a curriculum that valued learning gained through extra-curricular experiences to complement the learning recognised through the honours degree. A feasibility study was undertaken between April and December and a framework was devised and presented to the University's Learning and Teaching Committee in January 2010. The Committee considered it needed streamlining so the framework was re-designed to make it more scalable and sustainable.

**Table 3 Award requirements**

**The award should build upon what you are already doing .To achieve the award you must:**

- 1) **Participate in a self-managed personal and professional development process**, taking responsibility for creating a personal - professional development plan, engaging in self-determined activities and experiences and periodically reviewing your own development. Activities are likely to include a mix of skills-based training activities, learning gained through part-time work or voluntary activities, and other significant activities defined by the scheme (open to negotiation with the scheme coordinator). Any qualifications gained externally, for example a national volunteering award, could also be included.
- 2) **Participate in three workshops (or on-line engagements)** to facilitate self-evaluation, personal development planning and CV preparation.
- 3) **Create a Life-Skills Portfolio** to record and demonstrate how learning is gained and integrated through a variety of life experiences including: 1) skills training on or off-campus 2) experiential learning through work, volunteering or other significant activities.
- 4) **Prepare a reflective account** (about 2000 words) to summarise the learning and achievements gained (and often already gained) through the experiences documented in your portfolio.
- 5) **Prepare an enhanced CV** to demonstrate increased self-awareness of what you have learnt and how you have developed, to add value to your employability prospects.

The University has a well developed educational model that involves the majority of students in experiential learning through professional work placements (Willis 2010). SCEPTRe is trying to add value to this model by developing capacity to exploit the potential for real world learning in the co- and extra-curricular spaces of the lifewide curriculum model (Figure 11). There is also encouragement for students to draw upon learning they have acquired in their academic curriculum and to apply this and learn from their experiences outside their course. The main features of the award/curriculum framework are captured in Figure 11 and Table 3. The total effort required to gain the award, including planning and evaluation workshops, portfolio creation, engagement in lifewide learning experiences, and preparation of a reflective account and an enhanced CV is about 150 hours.

The thinking developed in part 1 has had a strong influence on the tools that are used to aid thinking, self-evaluation and personal development. The starting point for the learner is to recognise the spaces and places in their life where they are currently learning through doing things. They begin by completing a map of their life Figure 12. Participants are invited to imagine a typical week in their life and to think about the things they do like study, work, volunteering, caring for someone and looking after themselves. They create a map showing the amount of time they spend in each part of their life? Identify the people they interact with the types of situations that arise and briefly describe what sorts of things they learn and how they develop as a person?

This simple map helps them explain who they are as a person and why they do the things they do and the choices they have made to find deeply satisfying and personally challenging situations that inspire and require their creativity. It reveals to them the richness of their learning enterprise and the forms of knowledge and knowing they utilise. It helps them appreciate their role as knower, maker, player, narrator and enquirer and can reveal how they are using technologies and media to communicate and participate in the social communities that are created around some forms of new media. It helps them to see their role as active agent in dealing with and creating situations: situations that sometimes are not resulting in success. It helps them appreciate that when they encounter new and unfamiliar situations they have to learn new things and perhaps change some of their earlier learning. Using the Cynefin thinking tool, the map can be used to reveal how students have engaged in different types of situation in their life help them to appreciate those parts of their lives where they are venturing in uncertain and unfamiliar territory. It can also be used to help them explore, and examples of the way situations are connected either by their own agency or someone elses and finally it can celebrate how they exercise their will to be and become a better more developed person and to create new value in the world around them.

Figure 11 The process of achieving an award

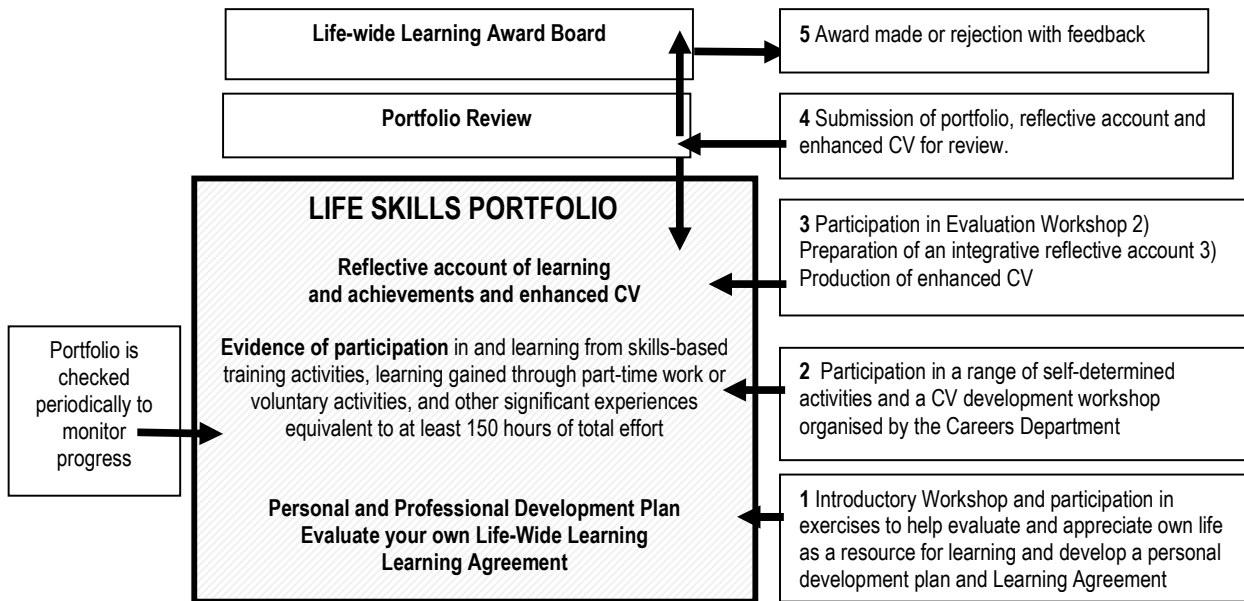
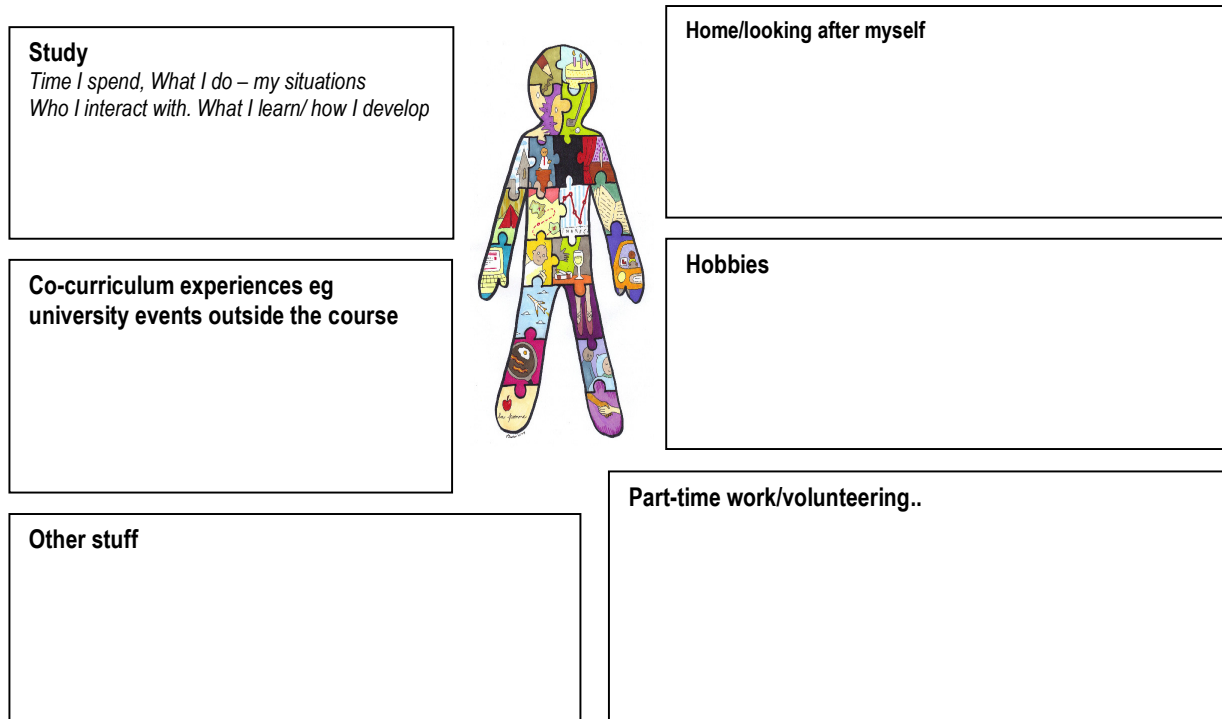


Figure 12 The starting point for lifewide education is the learner's own life



## Capability, qualities and dispositions developed and recognised through the Award

The thinking and propositions developed in part 1 have had a strong influence on the capability statement that underpins the award. If we are to try to develop graduates who are highly effective in the world, in the manner depicted by Eraut (2009) and Greene (2004) then we have to pay attention to developing capability in an all-round sense for affecting and creating situations. The Award therefore emphasises the importance of developing capability to deal with and create situations (particularly new and challenging situations). The capability statement for the award is given in Table 4.

**Table 4 Capability statement for Lifewide Learning Award**

**Being able to deal with situations involves solving problems, work with challenges and creating opportunities for themselves.**

Accounts of learning through doing will show how students have worked with challenge and uncertainty, engaged with problems and made things happen in a range of *real world* situations. Stories will reveal how they have understood and analysed a situation, decided what to do, found things out in order to decide what needs to be done, done things and learnt through the experience. In short, how you have made things happen. Stories will not necessarily reflect success: in some cases stories may reveal significant setbacks and demonstrate resilience in the face of failure.

The award encourages students to think about a number of important dimensions of capability to deal with situations and make things happen. In particular,

- **Being able to develop the knowledge needed to deal with a situation**
- **Being creative, resourceful and enterprising:** to make things happen, invent new solutions, adapt to changing circumstances in novel ways and create new opportunities by connecting people and integrating ideas, resources and opportunities, in an imaginative, wilful and productive way, to create new value
- **Being an effective communicator :** to communicate in ways that are appropriate to the situation, and communicate to different audiences using different media.
- **Being able to work with and lead others**
- **Behaving ethically and with social responsibility**
- **Any other aspects of capability you consider important for a particular role**

The award also encourages students to reveal

- **How they have exercised their will to be and become who they want to be**
- **Their values and how they have influenced what they have done**
- **The way their confidence has developed** as a result of encountering and dealing effectively with situations, accomplishing new things and coping with significant challenges.

If requirements are met the student will have demonstrated their ability to recognise and manage their own development: an important aspect of the continuing development of capability for learning and living in a complex world.

**Managing and evaluating their own development involves** the attitudes, skills and behaviours that motivate and enable you to take responsibility for, plan and engage in experiences that enable you to develop yourself. In successfully completing the award you will have demonstrated that you have:

- taken responsibility for, thought about, planned for and engaged in your own personal and professional development, taking advantage of the opportunities available to you on and off campus
- reflected on and evaluated the learning, personal and professional development you have gained through the experiences that you have chosen to incorporate into your claim for lifewide learning
- documented your experiences and what you have learnt from them, and gathered and organized evidence of your learning and development in your Life Skills Portfolio
- summarised and communicated what you have learnt and how you have developed through a reflective account and an enhanced CV.

## How will this particular framework facilitate students' creative development?

There is intentionality in the Lifewide Learning Award Framework to foster students' creative development and enable them to gain recognition for their creativity but the framework is not overtly formed around this goal. Rather, the intention is to focus

participants' attention on the way they deal with and create situations in different aspects of their lives encouraging them to be more aware of the capability involved in this process: capability that involves their creativity.

The central purpose of the Award Framework is to enable higher education to recognise how students make their own educational experience more complete: their individual pathways to self-actualisation. The role of the framework is not to force people to learn prescribed things it is to encourage and give recognition to the learning and personal development that they determine for themselves. Participants gain recognition through the stories they tell in their reflective diaries or reflective account at the end of the process. I include below some examples of students stories to show how they connect to the propositions that were set out at the end of part 1 bearing in mind that stories often relate to several rather than a single proposition.

**Proposition: In order to facilitate students' creative development for the real world we must create a curriculum that gives them the freedom and empowers them to make choices so that they can find deeply satisfying and personally challenging situations that inspire and require their creativity. A curriculum should nurture their spirit: their will to be and become a better more developed person and create new value in the world around them**

#### ***Student story***

Before University I had already volunteered with deaf children, been involved in the development of a haptic chair for a deaf school in Sri Lanka by allowing them to listen to music through sound vibrations, tutored two boys with autism, helped two families with children with cerebral palsy, and cared for children whose Mother was deaf with tunnel vision. I had also taken a sign language course in order to be able to communicate with her. My love of volunteering did not stem from any particular point in my life, but rather a natural instinct. I saw my first year at University as a chance to use the resources around me to make a difference on a larger scale. I took part in the tutoring & mentoring programme to mentor children from broken backgrounds or with learning difficulties. I also approached the Students' Union with my idea for a volunteering trip to Africa, and they told me of an existing link with the Guildford charity Experience Culture. This civic project involves partnering schools in Guildford with schools in Mukono, Uganda. I emailed the whole student body and gathered a small group of students to go out with, then began 6 months of hard work fundraising including a marathon bake sale and a dodgeball world record attempt!

It took 6 months of planning, fundraising, and co-ordinating the trip and we spent 4 weeks in the field at Mukono. I took on the responsibility of ensuring it all came together, booking flights, holding meetings with outside bodies, making sure the other volunteers were prepared and cementing the links with our contacts in Uganda. Our objectives were to help educate the people in the rural communities to improve their standard of living, and raise awareness amongst the children and people we encountered to a world outside their own in positive ways, and be aware of the rich cultural experience we were having and what we were learning. We talked about our work continuously and made adjustments in response to the feedback we received from the local people we worked with. Although we planned our overall work programme and had a daily plan, we learnt to adapt to situations as required. We evaluated how well we achieved our objectives through the feedback we received from the people we worked with.

We quickly realised how vast the problems we were attempting to help fix were. We identified so many obstacles just through our experience in one town in Africa, such as local governance, lack of education and weariness of hardship, that it was difficult not to become disheartened. But these realisations also fuelled our passion to help others, and we do believe that we met our objectives. We became extremely involved in the schools and their children's welfare, counselling some of the children, putting some of our money towards painting a library in the Children's Home, and gaining an understanding of their fantastic culture and also the intrinsic problems it brought. The trips into the community highlighted the latter, and were the most difficult part of the whole trip for us. It was extremely painful to see people in such extremes of poverty and illness, hear their stories and feel their burdens.

We cannot claim that our volunteering was exceptional compared to other volunteering projects: but it was exceptional to us, and it made a difference to the people we worked with in Uganda. People would come up to us to shake our hands in the street when they heard of what we were trying to do. It is not just the end product we are proud of, but the process we went through as well. The initial idea, the fundraising events, every moment of doubt we overcame, every smile received, and every idea we sparked for other people to do the same.

On returning to the University in autumn 2009 we wanted to do more so we established the 'Do More' society for students who wanted to volunteer and this is the legacy of our commitment to volunteering at the University of Surrey. Since we established the society volunteers have been involved numerous projects within the Guildford community. This has created an impact even in its' first year. Part of sustaining our work in Uganda is to keep channelling volunteers into the same project and supporting the charity Experience Culture so that it can help people in different parts of England to participate. The group of 6 students going out to Uganda in summer 2010 will be following up on the lessons we taught, projects we began and will be monitoring the progress of our 5 year plan with the Health Centre. We will be working closely with the agricultural farm we stayed on growing more sustainable crops and the training of local farmers from all over Uganda to adopt better farming practices. We are also holding a book drive to send books



to the library we set up in the Children's home to help improve literacy levels and also expose the children to the types of books we read here, as well as raising funds for the school to buy their own Ugandan children's books. In addition, we are in the midst of creating durable education packs for the Health centre. These books will contain information on basic English phrases, health & hygiene, sex education, and HIV/Aids, and will be brought out into the communities by volunteer representatives in the Health Centre to teach it to them. In this way we hope to begin to overcome the largest problem in the spread of HIV, STDs and level of rape incidents, which is the lack of education about these matters.

Being a part of the group visiting Uganda has enabled us all to gain a greater sense of perspective on the wider world, we now realise that no matter what our individual burdens are in our daily lives, we are still lucky and truly appreciate this, focusing on the core priorities in life and not spending too much time worrying about the things we are unable to control. Being given the opportunity to work with different people from different cultures and backgrounds has made us realise that you do not need a shared language to communicate, that love and compassion transcends this barrier. As a result of our experiences we now feel more confident and can see how this has enhanced our ability to deal with new situations and how the skills can be applied in other areas of our lives now we are back. This is true particularly of our ability to raise awareness and communicate with each other and new audiences the urgency we feel to help and continue to try to make a difference to peoples lives. Above all the experience has reaffirmed my beliefs and sparked my passion to try to do more. This passion has helped me create a new volunteering society and inspire others to get involved. Being able to tell our stories about what we have seen and show how we managed to make a small difference has enabled us to communicate our enthusiasm and experience and inspired others. *Student entry for a national volunteering award*

#### **Student story**

Learning can happen as a result of a single experience. One influential experience lasted mere seconds, but the impact it had upon me then, and will go on to have in the future is endless. The experience that changed everything happened in an average clothes shop in an average town on an average day. It was on that day, in a dim lit, overheated changing room that I realised that the average UK shop no longer made trousers that were big enough to fit my waist.

Up until this point my life had revolved around absent nutritional morals and an unhealthy inactive lifestyle. Everything I was...was my own doing. This was one of the hardest things about my journey... to accept my own personal responsibility. ...After this realisation I knew that I had to turn my past lifestyle around in order to create a better future for myself, both in terms of health and opportunity that my weight may have denied me..... a year and a half of sacrifice, development of will and determination saw me drop my weight healthily from seventeen and a half stone to ten, with a reduction in waist size of just under 20 inches.

After I had lost my weight, I set the goal, that by 2009 I would become a Personal Trainer, so that I could give something back to people who were in similar situations to myself. I had grown up overweight. I had little interest in sport and had always underachieved in P.E sessions throughout secondary school. However, my severe lack of knowledge on the subject did not stop me. I had grown to love the gym, since my change, and knew to help others in the desired way I needed to start in such an environment. I began working at a Sports centre for a number of months, but grew frustrated by the lack of interaction I got with clientele. Cleaning machines, to me was not allowing me to have the impact on people that I wanted. I worked at Microsoft during a placement year, and a large proportion of my paycheque each month went towards funding me through studies to get myself qualified as a personal trainer.

It has been over a year now since I qualified as a Level 3 Personal trainer, and I have continued my learning further and further, getting more and more qualified so that I can offer my clients not only advice from my own experience, but also based upon firm academic study. I have attended qualification weeks with the UKSCA, I have developed mentor relationships with top fitness professionals, I am on my way towards passing tough qualification's set by the CHEK institute, as well as many other things, all for my clients. To this day, on top of my university studies I have 10 regular clients who I spend an hour with each and every week, helping them get closer to their goals. The most satisfying thing is that I can have an impact on their journeys, I can get them into good habits and I can accelerate their efforts with my subject knowledge.

I developed so much as a person during my initial weight loss phase, I was able to focus on targets and achieve goals no matter what the barriers, I developed will and determination, and the ability to never give up. All these have helped me during my studies at the University and during my commercial business experiences. As a personal trainer I have learnt so much more though, most of which was completely unexpected. I have learnt what passion is, and how infectious it can be. If you are passionate about your subject, the people you teach too will be passionate about what they are learning, and as a result achieve more. I have built my confidence, so that it is almost unrecognisable compared to a number of years ago. *Entry to 2010 Lifewide Learning Competition*

#### **Student story**

I have a brother who is severely visually impaired and categorised as a blind person. As well as being blind his left hand is partly paralysed so that he can not use it.....I decided to accept the responsibility to take care of my brother in order for him to come to the UK and develop his English skills and follow his dream of pursuing higher education. It was a big responsibility because I had to cook for both of us everyday and clean everything, as he cannot do many of the things that would be done by the average individual. I had to sort out his belongings, take him to places where he needed to be and fill out all his forms. I also had to support him in many other areas of his life. Prior to my brother moving in I thought that caring for him would occupy my time and stop me from my studies

and that I would fall behind everyone else on the course. However I now realise that whilst caring for my brother, a whole new horizon opened up in front of me. I discovered that there is much more to this life; this life is not just about me. My personality and character grew so much during this period because of the difficulties I went through and the contacts that I had to make in order to help him. The word 'service' found a very deep new meaning and value in my mind and heart. *Entry 2009 Lifewide Learning Prize*

**Proposition: In order to facilitate students' creative development for the real world we must create a curriculum that enables them to experience and appreciate knowledge and knowing in all its forms. And enables them to experience and appreciate themselves as knower, maker, player, narrator and enquirer**

#### **Student story**

Going through my MSc did not come in as a bag of roses. As much as I spent time, effort and energy to gain the knowledge, I was engaged in part-time working to take care of myself and my family. I had a wife who was expecting a baby soon and this was a big change for anyone to manage. Things seemed to move too fast too soon. I took this as a test of my ability to multi-task and to manage the multi-faceted nature of the forever fast-paced society in which we find ourselves. The part-time jobs I engaged in had a lot to do with customer facing experience. So apart from developing the required knowledge I wanted to gain at the University, I was simultaneously developing the required soft skills/experience required for a leadership position in Engineering. The fact that I had two part-time jobs, an MSc to manage, and a wife and baby to spend time with, inculcated a lot of discipline in time-management in me that has stayed with me till this day. *Entry 2010 Lifewide Learning Prize*

#### **Student story**

It's our student's union official TV station. We broadcast via the web and I work on the technical team over there, on actually going out on shoots, filming the reports, working on the sound, then working on the editing. I also designed the website for Mad TV, which is where we broadcast all our things. ....We publish online, so it's intended for Surrey students because we are covering news events round campus and around in Guildford....At Mad TV I learn more of the practical things, but the course itself teaches me the theory behind it. So, I might know what a particular equipment does, but then the theory behind how it does it is what I learn in the course itself. So that is where I find that I get a good balance of both things.....to give you a very simple example, in Mad TV we have to edit let's say an audio interview. Now, I worked on the audio editing software that we use, I know the different sorts of tools and effects that it has over there, and if I apply that on that audio interview, then what effect it has on the actual recording. That's what I learn practically from let's say Mad TV, but in the course itself, I am in the lab demonstrations that we have, which is like just six hours a week, in that, I actually learn if this is the effect that I am applying, then what is it actually doing into the whatever sound recording that is there, in theory. *Student interview*

#### **Student story**

I took an active role in the Digital Story academy and on the Digital Story site, so far i've learnt an awful lot about web design and video platforms from HF. Initially it took me a while to get my head around a new programming language but having HF around helped. He gave JP and I support whenever we needed. *Student reflective blog*

#### **Student story**

My role as a Court Life Mentor naturally involves listening to each and every one of my 41 mentees (fortunately not all 41 every week!). This was particularly highlighted on my shift this evening as one of my mentees just needed to have a bit of a rant about a housemate. Reflecting on this conversation made me realise all the skills I had to use just in that 15 minutes of conversation. First of all I must have already built up a relationship with this mentee as otherwise he wouldn't have confided his troubles in me. Next I realised how important body language was throughout this conversation. Maintaining eye contact and making sure I wasn't closing myself off to the mentee was important in keeping the conversation going and for extracting more information from him. Also I used open ended questions in order to maintain the flow of conversation as we were shown in training. All in all, this one conversation and the realisation that I had built relationships with my mentees, I am obviously approachable and easy to talk to and of course a good listener, made my shift a successful one. *Student reflective blog*

#### **Student story**

In addition to the LLB Law with Criminology programme on which I am enrolled, I am currently working as a youth worker with Surrey County Council developing their youth offending team. Through this position I am undertaking a VRQ in youth work in addition to the various Open College Network qualifications that I already hold in 'Developing Leadership Skills in Young People'. In order to gain these qualifications I have been involved in various youth projects on a voluntary basis, including the 'Mid-Surrey Project For Young Carers' which caters to young people who care for terminally ill or severely disabled family members. As a result of my upbringing I am a firm believer that it is voluntary youth projects, such as the 'Mid-Surrey Project for Young Carers' that allow young people to set and achieve their goals. Having lost my mother to cancer when I was fourteen after being her primary carer for a number of years I feel that it is through these projects that I am most able to give invaluable help and advice to young people in a similar position to mine. If I am able to pass on the knowledge gained through my experiences then I feel that it could be beneficial to others. This has allowed me to gain a different perspective on my life and allowed me to become more comfortable talking about my life experiences. I have also recently been offered the position of Governor on the panel overseeing 'National Clubs for Young People' which co-

ordinates all youth projects nationwide in England and Wales. I believe that in this position I will be able to maximise my input regarding the development of youth services, particularly in Surrey, but also nationally. These positions will aid in my pursuit of a career working as a researcher at the Ministry Of Justice, where I hope to direct government policies regarding youth offending. Despite studying Law, I do not intend to become a Barrister or Solicitor, preferring the criminological aspects of my course. *Entry 2010 Lifewide Learning Prize*

### **Student story**

The choice of volunteering within an infant school came from a desire to help people. My previous work experience had left me behind tills, washing dishes or feeding the elderly. The latter began to show me just how wonderful it is to make a difference in people's lives.

I began as a teaching assistant but soon began to realise how much of a difference can be made in a child's life by the adults who guide them. After just a few weeks I found I lacked the confidence to initially raise ideas within my working team. This I considered to be one of my greatest weaknesses. The need to present my ideas to eight other people in my team terrified me. In one instance after nervously presenting my ideas for a harvest assembly, the teacher I worked with inspired confidence in me just by saying what a good idea he thought it was. My creativity began to exert itself in the research for new stories for the children to enact during their assembly and creating props left me smeared in paint and with a smile on my face. I believe my initial nervousness came from feeling that I was just a student. I had never been in a circumstance where research and ideas I had written down could transform from words on a page to a wonderful show before me that the children could perform for their parents. From that point on I began to consciously contribute during meetings and was no longer held back by the thought that my lack of work experience in education would detract from my ability to make worthwhile contributions to the school.

The ability to form interpersonal relationships with all members of staff came easily to me. I enjoyed working with everyone and found myself being able to differentiate my communicative behaviour between my adult team members and the children within the class. I began to unravel the intricate workings of a child's mind and the fantastic perspectives they can bring to their own learning. This enabled me to teach concepts ever so more effectively, a skill that academic research could not have aided me in. Seeing the children grasp a mathematical concept I had taught them and then perform it independently, was magical. Observations I made of techniques to mediate difficult behaviour, enforcement of school rules, the reward systems available to children and the many ways in which different teachers taught their class left me with an extremely rich perspective. Not only was I learning the crucial skills that many students learn as part of a teaching degree but I was able to evaluate and integrate different teachers styles to form a style of my very own.

Despite volunteering I treated every job with the utmost importance and attempted to excel myself in what ever I was asked to do. I believe my willingness to do whatever was asked of me and the efficiency and enthusiasm I brought to my work was the reason the school offered me paid work in my forth month with them. From this I was given my own class for an hour and a half once a week in which I had the opportunity to help them develop their writing. Again, I had been shifted from my assistant position and handed down a great responsibility. The difficulties in managing a class independently, preparing much needed resources and planning techniques to engage the children were all experiences working as a classroom assistant would never have placed upon me. The submersion in yet another new environment began to further enrich my knowledge.

The days of reading academic materials to greater enhance my knowledge seemed far behind me. The richness of experience in the world of work began to replace the dusty books on the library shelves. My learning became through action, what worked and what did not, observations of my peers and the chance to experience many different aspects of working within the school.

I believed my short sabbatical from University would lead to the attrition of the brain cells I had been so dependent on during the two previous years. I began the final year of my undergraduate degree and to my delight was able to keep working two days a week at the school around my lecture timetable. ...However the interaction between my practical learning and my theoretical knowledge of psychology began to occur. The modules I began to study reflected in my practical work. Lectures regarding special educational needs began to uncover the complexities of dyslexia and maths disabilities and led to adaptations in the way I would teach in the classroom. My new found knowledge of the development of children's drawings allowed me a window into the children's emotions and alerted me to signs in drawings that conveyed how they were feeling. Revision left me creating real life examples in my head that eased the ability to remember key points I wanted to raise in my exam answers.

So to say that the submersion into the world of teaching wasn't a shock would not be true. However the same can be said for any new job. The integration of the academic world and the working world helps to nullify that shock. Facing your own weaknesses and pushing yourself to improve on them is a very difficult task but one of great importance. The impact that theory and practice have on learning is one of richness, where the rewards of your efforts are easily reaped. A new world need not be avoided and a new experience need not be approached with fear. Often we find ourselves better equipped than we could have imagined.

My future now seems clearer as I begin preparation for my graduate teaching programme to commence later this year. It's so important that such an overwhelming experience is not feared but approached with determination. As each new experience gradually

becomes our familiar, shallow end of the pool, we must push forward towards the deep. For knowledge can never be finite and I believe submersion into new working experiences is the best way to learn. *Entry 2008 Immersive experience competition*

#### **Student story**

Perhaps my most prominent hobby during my time at Surrey has been Australian Rules Football – AFL. I took up the sport less than two years ago through an Australian friend, who was coach of club side London Swans at that time.... After being battered and bruised after my first game or two, I started to learn the rules and train more seriously and managed to make the Premiership play-off finals with my club, Putney Magpies, in my second season, confirming us as the second-best team in the country. Playing in a league full of Australians who have played AFL all their lives motivated me to train hard and take the sport seriously (to avoid injury if nothing else!). I was rewarded with a call up to the Great Britain squad last spring, and was delighted and honoured to be named in the squad for last year's International Cup in Melbourne, Australia.

During this period I also organised a charity game for the Great Britain side against an Australian side in my home-town of Sevenoaks, Kent. I organised the event alone, organising a range of generous sponsors; a venue; licensing; food and drink; first aid; printed t-shirts; designing, writing and printing programmes; selling around 250 tickets; and raising several thousand pounds for charity. Needless to say, the effort required for this was huge, as was the learning curve. To have organised such an event on such a scale was very challenging but a real pleasure to behold.

At the International Cup my highlight was our narrow defeat to eventual winners Papua New Guinea, for which I was named "Best On Ground", one of the biggest honours of my life. Following the triennial International Cup, I was given the huge honour of co-captaining the English national side to the European Cup in Prague last October. I was lucky to be able to call on my experiences and learning in Australia and we managed to win the Cup without really being challenged all the way through the competition. In just a few months I had enjoyed huge success both domestically and internationally, and my medal for the European Cup will be something I will cherish forever. Competing in team sports at the highest level has helped me learn the team-building skills required throughout life. And as captain the responsibility for raising morale, gelling a team together and generating a winning mentality has to be the biggest honour for an international sports person. *Entry 2009 Lifewide Learning Prize*

**Proposition: In order to facilitate students' creative development for the real world we must create a curriculum that enables them to appreciate the significance of being able to deal with and create situations and to see situations as the fundamental opportunity for being creative. They need to be empowered to create new situations individually and with others, by connecting people and transferring, adapting and integrating ideas, resources and opportunities, in an imaginative, wilful and productive way, to solve problems and create new value.**

#### **Student story**

To enhance the communication within the students of my department and to bring some exciting research work, I got together with a few friends and set up a computer society. We were created in collaboration with the young professionals group of the Guildford branch of the British computer society. I had been extremely active within the group during my first year but the society took it to a new level. I was elected the president. This gave me a chance to create opportunity rather than just use it. Apart from social events, we organised projects for students to work on. Our society created the website for the IFestival held at university. Even though I did not work on the project itself, I facilitated it. I had never imagined I would be able to do things like that. I was invited to the branch committee meetings of the BCS. It was a huge honour sitting in the same room as some of the best people in the area in my field of interest, discussing ideas with them and even trying to get a few interesting projects for my members. I was able to get a few more that are still in the pipeline and would help enhance the skills of some of my colleagues.

*Entry 2010 Lifewide Learning Prize*

#### **Student story**

I wanted to celebrate International Day of the Midwife in style! So I organised a study day. I emailed round to every influential midwife or midwifery organisation I knew hoping they would speak on May 5<sup>th</sup>, to celebrate and raise awareness. All money raised would go to WRA, so evidently they would not be paid for the day. I could not believe it; I had the day full of speakers within 1 week. I contacted the student union and the marketing team at Surrey for advice and help and managed to get some really helpful advice. I booked the room, organised the parking, got a discount at the restaurant for those attending, made posters, started a JustGiving page, started a facebook group, and even contacted midwifery related organisations for leaflets and freebies so that all attending would get a "goodie" bag. I contacted local companies for donations and now have over 10 items to raffle off for even more money for WRA. I received amazing support from midwifery journals and websites who have advertised the event for me and I even held a contest to win a ticket. To date we have already raised £320, which definitely beats last years total, and we still have three weeks to go! We have students from all over the country attending and even some that have just been accepted to the University for entry next year. *Entry to the 2010 Lifewide Learning Prize*

#### **Student story**

One of my lecturers developed a platform on which students could practice their programming in a competitive environment. Having used the platform, xxxx and I saw the potential to scale this up to a national contest, using our contacts at the British Computer Society (BCS) to promote the event appropriately. We were delighted to launch the BCS Student Contest 2009 on March 10th. XXXXX and I secured two Asus Eee PCs to give away as the top prizes, to be awarded to the winners of the contest, which runs until June 1st 2009. *Entry 2009 Lifewide Learning Prize*

### **Student story**

This week, wasn't a great week for me, Thursday in particular was my worst day at XXXXXX to date, we had a lot going on during the week... On Thursday JL had set up a seminar to showcase her [students'] digital stories to staff and academics. I was aware of the seminar roughly two weeks before hand and I had requested that BM take a look at some of the footage that I had edited of the feedback session as I felt I hadn't done it justice. BM did a good job and now on Wednesday afternoon I began a discussion with JL about what she would like in her seminar from a technical point of view (ideally I would have preferred to have started this discussion the previous week but J's a busy woman and I guess I didn't really foresee many possible problems with what I'd imagine she would like to have in her seminar). J requested that she would like her digital stories to be played in her powerpoint presentation-I've done this once before so I didn't see this as an issue. It as left that J would send me her presentation before 11am the next day as she was putting her presentation together in the morning as J was tight on time..

However, it became apparent after my meeting with J that I would have to convert the digital stories which were in the format of a .mov file to a .wmv so that MS Powerpoint could playback the 9 digital stories each lasting between 2-5 minutes. As it was nearing 5pm after my meeting with J we set the computer to convert the file format of the stories overnight as it would've taken a couple of hours and we had made plans to go Laser Questing..

On Thursday morning, the files had been converted and we had assumed they all worked..it wasn't until around 10am that I played back one of the digital stories and worryingly it was only 30 seconds long..at this point B & I were concerned, but B said he know how to fix it but it would take about an hour to fix..J's seminar was due to start at 12:30 so I left B to fix the digital stories and I began setting up the streaming-which had become second nature to me. I did a test run with the streaming and all was good! I'd then at 11:30 received J's presentation and at that point was getting twitchy because B was still working on the digital stories and was had less than 40 minutes until the seminar started. By 12:15 B handed me a DVD with the digital stories on them, I quickly rushed to put them on the presentation (which isn't a snappy process!) by this time the room was beginning to fill up and I felt the pressure. I eventually finished importing the stories into Powerpoint and just hoped that the stories worked but I knew B didn't have time to check them all..

The seminar started and I then went over to check on the streaming [to participants outside the university] which I had setup earlier. What I soon realized is that the streaming laptop had been installing windows updates while I'd been working on the J's seminar and of course one of the updates was a USB driver for the capture card we use to connect the video camera to the laptop. The update had uninstalled the existing driver for the capture card which of course meant we couldn't stream anymore without reinstalling the USB capture card driver as every-time I tried to setup the stream, the laptop crashed. At the time I knew I could've solved the issue I just needed to spend some time on it however my attention was diverted to J's digital stories which again only played the first 30 seconds! Meanwhile, during this time C told me that there was an AGN session and a interview session starting at 13:00.. so i had to juggle help contain the damage in J's seminar, attempt to fix streaming, run an AGN session and setup filming for interviews for the international office all at the same time-sods law B had gone to lunch! I really found it tuff, it was becoming my worst nightmare and at that point I really wanted to panic..

I asked C if she could setup for the interviews and try and get in touch with B, I quickly setup the AGN and put all my attention into J's seminar. It had now became apparent that it was a damage control exercise for J's seminar and for the first time I really felt I'd screwed up royally..in the end although I tried I could only play 2 full digital stories and the feedback session.

For me, it was a disaster and I personally felt I'd let the team down especially J and N who of course were very kind and supportive. With the benefit of hindsight I should've told Jane that we should just play the digital stories on a DVD and forget about incorporating them into her Powerpoint presentation although having said that I should automatically have done that as a backup option. I should've converted one of the digital stories on Wednesday evening just to see if it worked and then we would've been able to tackle the problem then and not a few hours before the seminar-if we'd realized there was a problem earlier we could've come up with better and more adequate solutions. I really should've been a bit more on the ball when it came to the streaming, I should've turned off the windows updates and kept the test stream online with the sound switched off. Thursday made me realize that I've been getting a bit too sure of things, as I've never really had any major problems with seminars apart from this one. I genuinely think upon reflection I've learnt that I need to say no to people/staff/colleagues instead of yes when really if its a last minute job I need to play it safe.. *Student reflective blog*

### **Student story**

I am in the process of starting up a new society I'd like to call "Knitters Anonymous". Knitting and crocheting are hobbies of mine, and I find them not only truly relaxing, but great ways to socialize with others and *create* some really nice items! I have already taught two of my housemates to knit and crochet and they are both addicted. They have been creating impressive pieces for friends and



family. The interest shown in this society has been overwhelming.... My hopes are that this will create a really relaxed social group that can get together regularly, teach each other and share patterns. A friend of mine in Canada began an organisation called "Love Knits" whereby people learn to knit and crochet, make and donate items to be handed out to the homeless in the city of Toronto. There are many charities and known groups nearby that we could knit items together for as projects. *Entry to 2010 Lifewide Learning Prize*

### **Student story**

In October, I was selected as one of 21 from all over Europe to attend a Gospel Choir conductor's week-long, all-expenses-paid workshop in Poland. This was an incredible opportunity and for me personally, a life-changing experience. It was inspiring to meet people from so many different cultures and backgrounds, and some with language barriers, but being brought together by the wonderful connection of Gospel music. I was so inspired by this week and longed for others to experience what I had, that when I arrived back at University, I started up a Gospel Choir.

Since about October last year, this choir has been growing rapidly. We now have a steady 30 attending rehearsals every Monday evening. We've developed so much as a group through performances and recordings, like a local church's carol service and the University's iGala as part of the International Festival. It has been an honour to hold the role of conductor and president of the Gospel Choir and see the passion for it spread. Through our stall at the re-fresher's fair and mini performances, we've featured on the GU2 Radio Station live and have had an advert in the Stag newspaper - making great connections with other societies like the drama group. The church that I attend has loved hearing about the Gospel Choir and how it developed from an idea into a reality, and we are currently in the planning stages of beginning a Youth Gospel Choir in some local schools.

So many international students have been attracted to the Gospel Choir. A few have said that they love coming along because it's such a great way of meeting and getting to know others. Others have said that it is the thing they look forward to the most in the week and miss it when on holiday! The Gospel Choir has been nominated by the students as the Best New Society for the Annual Student Awards. *Entry to 2010 Lifewide Learning Prize*

### **And another story which shows this situation from another student's perspective**

After the ritual hunt for my keys I was welcomed by my bouncy flat mate, S. S is one of the happiest people I have ever met and her enthusiasm is catchy.

"Wanna go Gospel Choir?!!!" she gushed as she followed me into the kitchen.

"Ahh I'm not sure, I can't even sing" I replied nonchalantly. Its not that I am usually this pessimistic when faced with a new challenge infact Soph and I had decided to join many societies but had felt unable to achieve at the level required and would often come away disheartened.

"Nah it doesn't matter" she urged "Their poster even advertises for non singers!" She beamed with anticipation, whilst blocking the only escape route.

"Fine but im leaving if its rubbish" I reluctantly pulled my half draped coat firmly back on my shoulders and did a u-turn. Those 180 degrees were one of the best decisions I ever made.

Gospel Choir creates a safe family atmosphere that aids total relaxation and the ability to lose inhibitions. Learning a new skill through an alternative medium has increased my self esteem and I have found a new confidence to perform in front of my peers. This time also enables me to reflect on my week and has increased my spiritual wellbeing that had previously been ignored before I joined this society. *Entry to 2010 Lifewide Learning Prize*

### **Student story**

Ok i just wanted to start off by saying this is my first time to do something like this. Im not the type of person who likes to write things down. I dont like to take notes in class, or keep a diary of my life. I guess thats because i have quite a good memory, and probably because im quite lazy as well. I would like to talk about one of my enterprise ventures that i attempted to do last year. I noticed last year that during the exam period, the library was open on a 24 hour a day basis. While this was quite good, and many students benefited greatly because as students we are more awake during the night. This created a very good business opportunity. After 10pm the store on campus would be closed, and most of the vending machines around campus are not working. The only place available to buy energy drinks was tesco. So i decided that i would go to macro and buy red bull in bulk. And go around selling it to students in the library. The idea was a very good one, and it was quite profitable. However there are many things that i learned and many mistakes i made. The first thing i learned was having a plan in place before hand, i didnt really kno how much i was going to charge for the cans, and how many cans i needed to sell each night. Also the fact that time is money. I had to sacrifice alot of my studying time, and alot of the time i ran out of cans, and had to run back and get more. Also i didnt realise how heavy the cans were, and keeping them cold was a big problem as well. At the same time I didnt get permission to be allowed to sell in the library, but i managed not only to never get caught, but also to get free publicity by the security staff using the speaker system to tell the entire library that selling drinks was not allowed. Another big problem i had was that i was too nice, and i would allow people to take drinks and pay me back the next day. I should kep a proper record of the IOUs, and made sure to get my money, but i didnt manage to get it all back.

So I guess from that experience I learned a lot about what not to do, if you want to be a successful businessman. I know some of it is fairly commonsense, but when you get an idea and start to work on it you don't think too clearly. I hope that was helpful. *Reflective blog from member of student entrepreneur society*

**Proposition: In order to facilitate students' creative development for the real world we must create a curriculum that prepares them for and gives them experiences of adventuring in uncertain and unfamiliar situations.**

The lifewide curriculum framework sees life as an adventure for continual learning and personal development. It simply embraces the places that people choose to adventure in, helps them express how they have gained benefit from the experience and gives them justified recognition, in the process showing them how valuable their disposition to adventure is to them in other parts of their life.

#### **Student story**

I joined Nonesuch for something to do with my Wednesday evenings, not because I loved the idea of becoming a morris dancer. I decided I would go to the weekly practices but never dance in public; that would be far too embarrassing. At my first practice I realised how hard morris dancing actually is. It only took a few practices for me to greatly respect the other members of the team and watch in awe as they danced perfectly in time. Not only this, but they were a great group of people who were clearly passionate about their hobby, and not at all embarrassed. I soon felt privileged to have the chance to be exposed to such great dancers, and to be taught by them.....

I can see how my hobby as a morris dancer may seem to have little bearing on other aspects of my life. In fact I would say it has had a fairly large impact. With regards to my career and future, I now feel much more determined to aim high and try new things. At the beginning of the year I truly felt that I would not reach a good enough standard to dance in public and it was tempting to sit back and not put much effort in. I really can see how putting in the effort can get you places you never thought you would be. I am going to enter my final year at Surrey with high hopes for my academic work. As well as aiming for high grades, I will be taking certain modules which I would have avoided before because I thought they were too hard. I also feel able to speak out against things I find unfair and challenge people's preconceptions about all activities. I think this skill will be valuable to me in whichever career I end up in. I am proud to be a morris dancer and will be talking about it for a long time after I have to leave. I dance with hankies and wear bells round my legs. But am I embarrassed? Not at all. *Entry to the 2010 Lifewide Learning Prize*

#### **Student story**

Knowing that the union helps fund clubs and societies made me feel like the university was my oyster. I decided to form my own Skydiving club with the hopes that it could be as successful as the other clubs out there. I had never done any skydiving in my life and I thought it would be fun to do. During December I sent an email to my department asking if people were interested in the idea. Within five minutes of having sent the message I had around 30 replies. I took the details of everyone and sent it to the union. I had at least 100 calls to dropzones all over England, France and Spain. The best place to do it ended up being in Salisbury. The dropzone was inside a big army base (Netheravon) that trained both soldiers and civilians. Being the military, they had the best equipment and a very competent staff. After talking to the manager, he agreed to charge us the cheaper military rates on the grounds that we were a student sports club. To us this meant that jumps could be as cheap as £10 each.

The first trip was very intense for me. Jumping out of a plane is not a natural thing to do and I was afraid from the moment I woke up. On Saturday we did all the training that was required. Six hours of theory and an exam at the end of the day. On Sunday we geared up and got on the plane. I was shaking and felt sick. My first jump was going to be at 3500 feet and I couldn't stop looking at my altimeter. Those were the longest five minutes of my life and every moment I wanted to get off the plane. I looked around and every other person sitting next to me seemed relaxed. At that point I slowed down my breathing and said to myself "these people are probably just as scared to jump as me, they just hide it better". Those words didn't make me feel any better.

When they opened the door I felt true terror. The surge of cold air made me shiver even more. The loudness of the engine made me feel frantic and that door was the embodiment of every fear I had ever experienced in my life.

When it was my turn, the jumpmaster shouted:

AT THE DOOR!!

LOOK UP!!!

GO!!!!!!

When I jumped my brain immediately shut down. They call it sensory overload. Your brain is functioning normally but there is so much to take in that it loses the ability to record new information. After jumping the next thing I remember is being debriefed about the jump on the ground. After many more jumps, all that fear has turned into pure adrenaline. I no longer have sensory overload. I'm addicted to the sky and I am happy that the other members of the club are too. *Entry 2009 Lifewide Learning Prize*

### **Student story**

'On the 20th February my housemate and I completed a jailbreak, raising over £1000 for Great Ormond Street Hospital childrens charity, by being sponsored to get as far as we could in 36 hours. We got the furthest out of a getting all the way to the Gulf of Mexico in 36 hours with no money at all. While we were staying in Texas, we resided with a friend of my housemate who kindly put us up in his house. From staying with him I was awed at his very different lifestyle. It was an eye opening experience to see Texas not as a tourist but from a local perspective. This again challenged my ideas of lifestyle and cultural norms. The jailbreak as a whole was one of the most rewarding experiences of my life and I met some fantastically diverse people. *Entry to the 2010 Lifewide Learning Prize*

It would be unethical to put students into the high risk, physically and emotionally challenging situations that some of students willingly put themselves into. A few years ago we ran an essay competition on the theme of immersive experiences and this revealed in a profound way the situations some students were prepared to venture into of their own accord (Jackson and Campbell, 2010). The lifewide curriculum framework permits students to gain recognition for what is often a transformative experience.

### **Student story**

The one person I have to thank for making it financially possible for me to return to university to continue my learning was L; the young girl who I worked with as a nanny. But not only making it possible for me to afford to learn academically, L also taught me the most important things I will ever learn about life. L was 9 years old. She was one of twins, born 5 weeks premature. At four weeks old L was left with severe brain injury from a car crash that killed her twin. I began working as L's nanny in November of 2006, and to say I was immersed in her life is an understatement.

L had an ability, like that of the moon, to pull in people like the tide, and keep them under her powerful spell, creating waves of emotion inside you that mirrored her own. She wasn't always happy. When L was down she would let you know. Her cry in the night would hurt you like physical pain as she could not tell you why she was so upset. All you could do was cuddle her for as long as it took to make her better. The total selflessness she provoked in me amazed me, I never thought I would care more about someone else than myself. To love someone else's child to the extent I did- I do- makes me realise how special L was. I hate to use the word 'special'. It does my opinion of her no justice. Wonderful. Amazing. Extraordinary. These are all just words, waves of ink on a page in different formations which attempt to represent the qualities of a person. But these qualities cannot be expressed in words, not to the extent which L deserves. Only the feelings inside will truly do her justice. And as there are no words to describe them, and so frustratingly they can never be wholly communicated and shared.

On 8<sup>th</sup> June 2007, L was getting ready for school with one of her other nannies. She became unconscious, something switched out her light, purloined her sparkle, and she was rushed to hospital. It could have been a number of things, her epilepsy, the shunt in her brain, maybe her breakfast went down the wrong way, who knows? Standing in that hospital room, I wanted to run, get out of her life because it hurt too much. I didn't want to face it anymore. But I stayed. Like the water in the ocean; it can't choose its direction, it just gets pulled by the tide in the same direction as the other waves.

We couldn't believe she made it through the weekend, especially past the 10<sup>th</sup> which was the anniversary of A's death. But she had to. I wasn't ready to let her go, not yet, not have her stolen away from my life which she reigned over. L was a fighter. Seeing her the way she was, not always crying and even managing to crack a smile through those struggled breaths humbled me and gave me strength. She was diagnosed with pneumonia, and within a few days was retrieved to an intensive care unit miles away in London. None of us thought twice about the tiresome, endless journeys back and forth to see our precious girl. Nights there weren't easy. The worry through all of the brain surgeries, the endless waiting for her to wake up, the tears on our cheeks, were taking their toll on us all. ....At every opportunity we could steal, every precious moment was spent telling her how much we loved her, and how amazing she was. Always feeling though that the words just weren't enough, no matter how much they were repeated, no matter how many kisses and cuddles accompanied them, it just wasn't enough. Much like the swells of the ocean, everyone had up and down days. We helped each other keep sailing on, sometimes feeling there was no way we were going to stay afloat. But capsizes we could not.

Finally the day came. I heard the dreaded word 'palliative'. There was nothing more we could do. She was going to die. As her protectors we felt we had let her down. ....We decided she needed to be at home, with the people who loved her most and away from all the machinery and uniforms. For the first few days at home people would not believe she was so poorly, she was like her old self but on 7<sup>th</sup> October L Jane passed away. All of the people whose lives felt they could not function without her were there, holding her hands and reassuring her, as she took her final few breaths, and was reunited with her twin sister.

L did not ever experience the pleasure of conversation, of walking, running, reading a good book, looking at a beautiful view, choosing her own clothes, making her own food, yet her happiness was overwhelming. The feeling of the wind ruffling in her hair, the sun on her face, the sound of the rain on the conservatory roof, the cupboards slamming in the kitchen, having chocolate buttons on her tongue, or the feeling of being tickled on her neck was enough. The pure emotion displayed by this amazing young girl has taught me to appreciate everything in life and in the world. I drive along a country lane, appreciate the trees, the music on the radio,

the ability to sing along, to be able to climb out of the car myself, everything; the small things which we don't often appreciate being blessed with. When things go wrong, like losing my mobile phone, having no money, putting on a few pounds, struggling with an essay, needing new brakes, tyres and exhaust all in one go... I take a step back and remember how lucky I am. These small hiccups are only a tiny part of the big world in which we live. Remembering to remember the important things is a skill L has taught me that I hope I will never lose. I realise the importance of appreciating those who you love, telling them so, and making the most of the time and memories you share. I try to pass on this perspective to others, and teach them some of the amazing lessons that L has taught me.

During the difficult times, and even now, I realised that sharing my emotions and upset help take away some of the pain, whereas before I used to bottle it up.....This is the most intense learning experience I have ever been involved in. Never have I been more immersed in any situation. I believe in any situation, you learn if there is some sort of love involved. If you love the subject you are studying, or the area in which you are writing an essay, or even the environment you are learning in, then you will succeed in learning. Saturated, tangled, absorbed, engrossed; you don't have a choice, the tide takes over you and pulls you in until you are truly immersed. *Entry to the Immersive experience story competition 2008*

**Proposition: In order to facilitate students' creative development for the real world we must create a curriculum through which they encounter and learn to deal with situations that are very demanding and which do not always result in success or achievement: in a disruptive world the development of resilience and persistence is a necessity**

#### ***Student story***

I went to Quito, Ecuador as part of a volunteer programme organised by the international organisation EIL (Experiment in International Living), in which I lived with an Ecuadorian family, learnt Spanish, and worked as a volunteer on projects. Being away from family, friends, and everything familiar enables you become truly immersed into a different country and a different culture....I've never had so many consecutive emotional highs and lows as I did in my three months in Quito.

After a month of Spanish lessons, I had 2 months of work. I chose to split my time between teaching English to children in a pre-school in Las Casas, a poor district of Quito, and working in Albergue La Dolorosa, a shelter for children whose families are unable to care for them. Having never done anything like this before, I didn't know exactly what I was expected to do. I was teaching with an English girl, and we tried to plan lessons as best as we could, but it was often in vain in a class of very young children with a poor attention span and little desire to learn anything. In the children's shelter, I played with the children, and helped one boy in particular with his homework every day. However, I still didn't feel like I was actually doing anything. I had fundraised for the volunteer expenses, and so I felt this added pressure to really do something worthwhile. My poor Spanish was constantly a barrier between what I was, and what I wanted to be.

It didn't help that I kept becoming sick, which made me very miserable. Things were going on back at home that I was missing, and I think it all just built up too much and there were a few days when all I could do was cry. I know Raquel and Paola were quite worried about me, and Paola came to talk to me to see what was wrong and I tried to explain it all to her. She told me that for a job to be satisfying, all you have to do is do it with love. That really changed my outlook on being a volunteer. I needed to stop worrying about what I was supposed to be doing, and just try and put as much of myself into what I was doing. She also told me that when something's wrong, you should put your energy into changing it, rather than letting it get you down. These are really simple words, but I needed to be told them, and it is advice that I will always remember.

This was a turning point. In the school, I decided to really try to get the children to actually learn something, rather than just getting frustrated when they would not settle down. Admittedly, the situation didn't get much better. The other teacher and I played musical chairs with the kids more often than taught them anything. In the shelter, I decided to use the extra time when the children were in school to re-decorate their playroom. I picked a sea-life theme, and painted murals of sea creatures on blue walls. When the children got back from school, they helped me out, often getting more paint on their clothes and feet than on the walls. There was paint on the carpet, huge drips on the walls, and one girl stood on a tube of paint that squirted all over the place. It really was a mess, and I had to reign in the perfectionist tendencies I sometimes have and try not to mind. It was really great working with the children, and they enjoyed it too. I have never been so stressed as I was about that playroom. I was leaving Quito in a few weeks and needed to get it finished before then. I had sleepless nights over it, and I feel stressed now even thinking about it, but it was completely worth it.

My Ecuadorian mother Raquel was a very strong woman. Being a single mother and career woman in a country that is still very chauvinistic and where women can't walk a few yards without the standard catcalls and whistles, she needed to be. She was sharp and I was quite scared of her. In my first weeks, I'd come home from Spanish lessons and she would ask me about my day, my life at home, etc. She was trying to help me, but I'd never spoken another language before and I was struggling with it. She would get frustrated whenever I didn't understand her, and attempt to say it in English in a really loud voice that always felt like she was shouting at me. I would generally let something like that wash over me, but in Ecuador I was very vulnerable and sensitive, and I was often close to tears whilst attempting to speak to her. I dealt with this by basically retreating from her, and trying not to care. I didn't see her as my mother or her apartment as my home. I stayed long hours at work and travelled whenever possible at the weekends

with other volunteers, and had some fantastic experiences with them. They would talk about their good relationships with their host families, and I envied them. I questioned my relationship with my actual mother, and decided to make a more conscious effort when I got home. I should have made more of an effort with my Ecuadorian mother too, as the host family is all part of the experience.

This was the lowest point of my time in Quito. I went back to the apartment still very upset and made a terrible attempt at explaining everything to Paola. Bianca thought it was her that was the problem and also got upset. It was absolutely a complete disaster. I've never been in a situation like that before, and I remember thinking at the time that I couldn't believe that this was actually happening. But it had to happen, as it was a revelation of sorts. Once I had let everything out that had been building up in my head, I was able to look on the situation as an observer and see how it really was. Raquel had only ever looked out for me, and looked after me. Her nature was sharp, but I shouldn't have taken it so much to heart. I am still ashamed about it all, but I had to learn the hard way how important it is to talk about things, as just letting thoughts build up in your head distorts them and only makes the situation worse. It is true that I didn't click with my Ecuadorian mother as I would have liked, but I should have given it more of a chance.

After nearly three months the city was beginning to feel like home. My Spanish was at its best and the playroom was nearly finished. I loved my journey to work in the morning when I could buy fruit on the street, converse with people in Spanish, jump on moving buses (something that I had put off doing for many weeks), run across the manic roads. One really memorable thing for me was buying curtains for the playroom. As I was dealing with the shop assistant in the drapery store, various customers would come over and try and help us figure out exactly what I wanted. When I had the material bought, the shop assistant took me down the street to a dressmaker, where another conversation of what exactly I was looking for ensued, again with the input of the other customers in the queue, and some pen and paper. It really was such a buzz being able to get by in a country in a way that I had never envisaged when I first arrived.

The experience made me appreciate how good my home country of Ireland is, and how lucky I am to have been born into a place where there are endless possibilities.....On the surface I don't think I've changed, but perhaps at a subconscious level I have developed the mechanisms to deal with being in a new place in a new situation with new people..... *Entry 2008 Immersive experience competition*

#### **Student story**

One of the biggest highlights [of my first year] was being involved in enterprise academy where I was given the opportunity to be entrepreneurial and work with a team to come up with a business idea and try to put it into action and make a profit [on a £100 stake]. Our team chose the idea of a 'battle of the bands' and so we set to work organising it. I got really carried away and made my first mistake of organising the bands, a venue, radio airplay and a date, within 3 days which I now realise was far too fast and didn't give me enough time to really plan anything. The second mistake I made was that I did all that without the team, which meant I forgot one of the main points of the task... 'The team has to make a profit'. Inevitably my group failed to buy in and we did incur the loss of £18 for the print cartridge. However, I ran with the idea by myself and went to GU2 radio the University's radio station on my own and got through to final contract negotiations with them. However, for some reason they pulled out; to this day I don't know why they pulled out, but I carried on, and eventually managed to get an interview with the Director of Eagle Radio, Surrey County's commercial radio station. He was very kind and told me that a national battle of the bands doesn't make much money, so a local one won't stand a chance.. thus my dream was over.. for the time being! *Entry 2009 Lifewide Learning Prize*

**Proposition : In order to facilitate students' creative development for the real world we must create a curriculum that enables them to develop and practice the full repertoire of communication and literacy skills they need to be an effective learner and communicator in a modern world and encourages them to participate in the social communities that are created around some forms of new media.**

#### **Student story**

Now there's one particular online resource that I have used in my final project more than any other, called [NUI group](#) and yesterday seemed like a good point to thank the community for all the resources they have collectively gathered and produced, and write a short introduction to my project to say what I'd been doing, and why it is different from similar systems. I was sure that people wouldn't be that interested because it is similar to a lot of their own projects, just with a couple of (minor) differences to make the system as flexible as possible. But just a couple of hours after I posted it, I got a private message on the site from Christian Moore, the founder of the community and silicon valley entrepreneur, who had hooked on to one particular aspect of the project I had mentioned and was really enthusiastic about it. He has suggested that we apply together to Google's Summer of Code, so that I can receive sponsorship to write some code for him to add into his forthcoming multitouch framework release, using my ideas. It's an awesome opportunity, which I really hope to make the most of. The university term dates may not allow this (AGH), but either way, lesson learned: don't assume that people aren't interested! *Student blog while working in CoLab*

#### **Student story**

I joined Second Life after seeing an article on it on the BBC news. The reasons I decided to enter the world of Second Life was first of all solely to make money. However, after making the jump into the virtual world I discovered so much more potential, the majority



of this based on communicating with others from all over the world. At first was fascinated by it but it was quite complicated to use and so I found the progress of discovering things rather slow.

The first barrier is that Second Life looks very confusing once you first join and quite often people gave up as they cannot get passed the barrier of understanding how things work. It is also quite daunting going into a new world where you are unsure what you are doing and have millions of people around you. The second is that it is hard to envisage what potential Second Life holds that actually has a constructive use.

The way I overcame these barriers was to complete an online tutorial which took me through the basics of Second Life. Once this was completed I was teleported into Second Life and found myself greeted by a mentor. They gave me a tour of various things you can do across Second Life including; good places to find free things for your avatar (your online character), areas with great scenery which I was amazed with how good it looked and finally they showed me various games you can play and suggestions on how to make money. Still in the frame of mind of making money, I taught myself how to buy and sell land which was relatively simple and this made a little profit but not much. I then took some free courses in Second Life to learn how to build things, which were invaluable to my immersive experience as now I am capable of building great looking objects which gives you a somewhat high level of satisfaction when it is completed, especially when others like your work and wish to purchase it.

It probably took about a week to learn all the basics of the above, and in fact one of the reasons I am still immersed in the experience is that I still learn new things every time I log in. I could have just given up in a couple of days thinking that I was wasting my time however every time I learnt something I had the desire to learn something else and so it kept going

Three months after I started Second Life I ran a charity event over Christmas, aptly named "The Christmas Project". I bought a huge plot of land costing £100 and a weekly charge of £10. I then started offering a service to designers where they can build things for free on my land as long as they are of a Christmas theme and that they are where I want them.....I allowed them to sell their designs on my land as long as they give 50% profits to the charity. A little later than I was hoping I finally found a charity that I wanted the project to be in aid of which was Children's Hospice Organisation ([www.childrenshospice.org](http://www.childrenshospice.org)). The result of the month's events meant that I had around 1000 people visiting a day and I made around £1000 for the charity which I was surprised, but very happy about. This spurred me on to do different events that were for my benefit rather than a charity. *Entry 2008 Immersive experience competition*

#### **Student story**

I've also subscribed to several nanotechnology newsletters to keep in touch with recent developments. This consequently inspired me to create a facebook group called "The Nanotechnology Group". Before I knew it I had more than 500 members from all over the world, the second biggest Nanotechnology interest group on facebook out of several groups. On that I shared information on recent developments, encouraged people to participate in the discussions, answered incoming questions on the subject, advertised upcoming conferences and highlighted good books on nanotechnology basics, advanced theories and applications. *Entry 2009 Lifewide Learning Prize*

## **Do students really care about these things?**

The stories I have chosen to illustrate these propositions show that some students care deeply and passionately about the developing themselves to be capable in the modern world. Indeed some reveal students who are well on the way to being highly effective in the sense of Greene (2004). In this article I have argued for the idea of lifewide education as a better approach to helping learners develop, practice, demonstrate and gain recognition for capability that is necessary in a modern world than more traditional forms of education. But do students really care about these things and do they want to put in the necessary effort to gain recognition for these forms of learning and development?

The answer to both of these questions is likely to be that some people do and some people don't: some people are ambivalent and some are passionate about their personal growth. In our Centre we work mainly with students who are interested in developing themselves... and being an idealist I am influenced by the people I come into contact with who tell me they value these forms of experience. But that anecdotal argument does not influence the decision makers in the institution.

In January 2010 SCEPTRe invited students to participate in an on-line survey aimed at gathering data on the ways in which students felt they were developing themselves through activities they undertook in addition to their academic programme. A total of 309 students responded and they gave us our first big picture of the sorts of activities they engage in and the value of such activities to their own development. Appendix 2 shows that students participate in a wide range of co-curricular and extra curricular activities and that many of these activities have enabled students to develop themselves in significant ways. 60% of

the undergraduate students who completed the survey said that they would be interested in gaining recognition in this way<sup>10</sup>. The highest level of responses (70%) were from students on their year long professional work placement: perhaps they are in a good position to appreciate the value and importance of informal and lifewide learning. The reasons given by students who felt they would gain benefit from some form of recognition are listed in Table 5. Reasons are both pragmatic – *recognition will help me get a job* and related to their self-esteem and self-worth *my experiences have made me who I am today*.

In 2009 and 2010 SCEPTRe offered prizes (£250) for the best personal accounts of lifewide learning. Students were invited to tell us, in no more than 1000 words, about the things they have done in addition to their academic programme while they have been at university and how they have developed as a person through doing these things. The two competitions attracted nearly 100 undergraduate and postgraduate entries and the stories that have emerged (some of which are provided above) provide all the justification needed for the award framework described earlier.

'To me, a complete education is not just about studying and gaining knowledge in your chosen field, but also broadening your horizons in terms of experience; as well as gaining vital transferable life skills. This can be achieved through involvement in extracurricular activities whether volunteering in your local community or being an active society or committee member on campus. Taking part in a range of events and activities is the perfect opportunity to meet new and like-minded people and improve confidence at the same time as gaining invaluable personal fulfilment; all elements essential for ensuring a well-rounded educational experience.' *Frances Boswell undergraduate winner of the 2010 Lifewide Learning Prize*

**Table 5 Reasons why students feel that formal recognition of their informal learning would be of value**

<p><b>Formal recognition of extra learning; of learning outside the course</b>  It would emphasise the value of skills and qualities gained from other activities  It shows that you are competent, and care about your personal skills just as much as your academic skills.</p> <p><b>CV building / greater credibility of informal learning/ gaining competitive advantage</b>  Proof of experience on CV  Hard to sell informal learning on my CV  Would distinguish you from people who said they had done things on their CV but didn't have an award  [Would] give me solid proof of my abilities for future employers and programme directors</p> <p><b>Useful at interview</b>  It would provide a concrete talking point in placement/job interview</p> <p><b>Improved employability prospects</b>  [Would] help me be more employable  It would help me to present myself wherever I would go.</p> <p><b>Professionally recognised portfolio</b>  I feel that I have experienced a tremendous amount of positive and worthwhile experiences whilst travelling around the world, living and working in other countries and volunteering in developing countries. All of these experiences have impacted so greatly on my life and have made me who I am today, I feel that recognition for this would enable me to have some kind of professional recognised portfolio, rather than 'just me' knowing about it.</p> <p><b>Personal worth</b>  Help me feel more confident and it makes you realise that your effort is worth it  Its nice when work you do is recognised and appreciated.  It would show what kind of person I am.</p> <p><b>Enhanced motivation</b>  It makes things more motivating  It will give me a motivation to learn  It will bring the best out of me.</p> <p><b>Connections and relevance to a degree programme</b>  Because it works sometime as a proof of being engaged with real life things related to degree or course I'm studying.</p>
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<sup>10</sup> A similar result (60% interest in gaining recognition) was obtained from a pilot survey involving 40 student nurses, midwives and operating department practitioners in 2009 (Jackson et al 2010)

In the 2010 survey we invited students to provide feedback on forms of learning and personal development they were gaining from their programme (Figure 13). On a 1-5 scale where 4 and 5 ratings represent significant contributions to personal or professional development, well over 50% students give 4/5 ratings to experiences of real world problem solving, team working, leading teams, adaptability, ethical awareness, self management and reflection for self-improvement. However, less than 50% of students gave 4/5 ratings for experiences of being enterprising and creative so perhaps there is scope for some improvement here.

**Table 6 Data from a recent survey of students lifewide learning at the University of Surrey**

Experience, knowledge, skills and qualities	Not very significant 1	2	3	4	Very significant 5	No response
Experience of real world work and problem solving	3	6	17	25	40	10
Working collaboratively (team working)	2	6	18	32	37	5
Leadership eg leading teams	3	14	22	32	22	7
Being enterprising	8	17	28	26	13	8
Adaptability	1	6	19	36	32	6
Being creative	4	15	28	23	24	7
Ethical awareness	6	12	21	28	27	6
Self-management	0	2	12	38	43	5
Able to reflect on and evaluate your own performance and plan for improvement	1	4	14	40	37	5

**Figure 13 Which of these forms of learning and personal/professional development do you believe you are developing through your programme and how significant are they to you? (N=309 student responses)**

## Final thoughts

Looking back to what I wrote in the final paragraph of my 2008 paper I feel that we are witnessing, with the widespread introduction in the UK of co-curricular and extra-curricular awards, the first step towards a lifewide concept of education through which the aspiration of a higher education system that is more valuing of students' creative development, can be realised.

'Being creative is a matter of choice, a matter of opportunity (often self-created) and a matter of knowing how to be creative in a given situation, or having the confidence to try and learn through the experience of trying. If we want learners to be creative we have to foster their will to be creative and help them develop the confidence, knowledge and capabilities to be creative. Imagine inventing an education system that has [this] as its core value and purpose.' (Jackson 2008a)

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## **Appendix 1 Minimal Description of All 32 General Capabilities and 96 Specific Methods of Highly Effective People Extract from '32 capabilities of highly effective people in any field' (Greene 2004:5-7)**

**Highly effective people have eight general capabilities.** The first four such capabilities are ways of using liberty they make for constructing, establishing, and founding enduring changes in lives and the world. They have ways, when encountering difference and otherness, of keeping what is new, difficult, and unknown or challenging from being absorbed and assimilated to their existing models and preferences. They have ways of preserving the otherness of what they encounter. Second, they have ways of unearthing the most buried, subtle, intimate, and vital forces and things inside themselves and examining them for possible use or improvement. Third, they have ways of bringing order to their own selves and to the selves of those in groups around them. Fourth, they have ways of turning insights, ideas, experiences, and the like into impacts on society, actual changes in how things are arranged and done. The second four general effectiveness capabilities are ways of protecting novelty from erosion by large, traditional, already established powers of the world. Fifth, they have ways doing things with style and verve rather than doing them perfunctorily. Sixth, they have ways of upping the performance of all dimensions of their selves, work, and lives, not just some or a few. Seventh, they have ways of influencing people, in many channels, modes, and means. Eighth, and last, they have ways of operating with new commonsenses, they borrow or invent, that make their automatic reactions up-to-date and future-looking.

**Other awareness capabilities of effective people** include ways of knowing and improving the quality of their work, ways of leading others, ways of learning with vast depth and speed, and ways of orienting themselves firmly in the anxieties and opportunities of existence. Knowing and improving quality involves having a way of measuring how well the outputs you produce satisfy users of those outputs. It also involves ways of identifying what it is, in how you produce those outputs, that causes traits in the outputs that dissatisfy users. It also involves ways of fixing problems in particular steps of how you produce outputs, so traits in outputs that irritate customers go away. Effective people care about how they are doing in others' eyes and work practically to continually do better. Less effective people care less about this or care the same but lack practical ways of adjusting outputs that dissatisfy people receiving them. Other awareness capabilities of effective people also include ways of leading people. Leading people involves a way of using people's time and talents well when people are together in meetings and events, a way of making every group or occasion you are in productive even if you have no formal leadership role there, and a way of getting others and yourself to develop and exercise power where situations or other people have to be influenced. Effective people are not content to let any situation they are associated with flop into slop, ineffectivity, or directionless mediocrity. Other awareness capabilities of effective people also include ways of learning with vast depth and speed. It is not an exaggeration to say that effective people excel in working with ideas in every context of their work and lives. They use, invent, apply, revise, fuse, improve, and inspire ideas. Effective people have a way of perceiving and operating mentally on entire structures of meaning, not just isolated single ideas. Effective people have ways of putting ideas into vertically and horizontally ordered patterns, regularized for easy long term memory and quick application to situations. Effective people's models of ideas differ in being more ordered, more visually appealing, and easier to work with than the models of less effective people. Effective people have ways of using tools outside their brains to make themselves intelligent instead of trying to be intelligent merely by cramming things into their brains, as schools unfortunately emphasize. Effective people excel mentally, handling dozens of times the number and quality of ideas as others do, but with greater precision and relevance in the same periods of time. Other awareness capabilities of effective people, finally, include ways of rooting self and emotion, goal, and career in the deepest anxieties and dimensions of human existence. There is an emotional poise and solidity to effective people that draws other to them. They generate happiness that others instead seek and search for, it appears. First, effective people have ways of inventing their own happiness in any situation that they are in, rather than needing certain situations or tools to make themselves happy. They amaze others with their abilities to invent ways to be happy in situations that totally dismay people around them. Effective people have ways of taking complete responsibility for every aspect of who they are, good and bad, and every aspect of what their situation is, good and bad. Effective people do not use aspects of their background or situations as excuses for inept performance. Effective people, finally, have ways of turning problems instantly into opportunities, rather than getting angry when expectations are not met, or when surprises bust up their plans.

Self awareness capabilities of effective people include ways of knowing yourself and linking it to evolving aspects of the world, ways of stepping back from all of your self and life and declaiming about the arbitrary aspects and sufferings of existence, ways of educating yourself in any situation or part of life, and ways of pursuing career in plural simultaneous dimensions of life. Knowing your self as a person and linking that person to evolving aspects of the world involves delaying reactions and using that delay to invent a style of presenting yourself to others and situations. It involves spotting baby new areas of knowledge or technology in the world and positioning yourself to ride them as they develop. It involves ways of breaking habits from schooling of inputting only all day with new habits of turning every input into some form of output others can be impacted by. Effective people link their lives solidly to fast evolving promising parts of their world. Stepping back from your self and life and declaiming about aspects of it all involves expressing anger at how human life and the universe are constructed and operate. It involves dialoguing with every important aspect of life and figuring out how you have related to it and how you might change how you relate to it.

It involves exercising your abilities to invest yourself fully in life and situations and to remove yourself fully from life and situations. Effective people build and rebuild, over and over again, new relationships with everything that exists, and with whatever created everything that exists. Educating yourself in any situation or part of life involves having a way of reading to fill holes and gaps in previous readings, in a spiral of learning, that allows you to teach yourself anything, even when you understand less than a third of what you at first read. It involves having a way of learning to present well enough to move immense audiences, transporting the spirit of all who hear you. It involves having a way of getting your ideas, imaginations, or accomplishments published and made present to remote audiences you could never personally contact. Effective people have myriad ways of becoming present to ideas, face-to-face, and remote audiences. Pursuing plural simultaneous careers in parallel tracks as you move through life involves having a way of balancing work to get money with work you love to get history's attention. It involves having a way of getting "promotions" not only in jobs, and in lifework efforts of love, but also in hobbies and professional association

off-hours roles. It involves having ways to get paid three or more ways for everything you invent--so you get paid for the invention itself, then you get paid again when you publish what you invent, and you get paid a third time when you teach others to invent or use that invention using what you publish. Effective people pursue plural career chances on parallel tracks all throughout life.

The capabilities that effective people have for ordering chaos include ways of changing yourself, creating culture, changing organizations, and using diversity in society rather than being disrupted or delayed by it. Changing yourself involves having ways of removing contents from your self and replacing them with better contents, helped by new friends and associations that welcome the new you that you are building. It also involves having ways of stopping your habitual customary ways of responding, long enough to insert consciously chosen better responses. It involves having a way of doing things indirectly by erecting environments around you that nudge others in directions you desire. Creating cultures involves having ways of inventing stories that sway and persuade people, having ways of stretching capabilities by intentional challenges just beyond your current capabilities, having ways of inventing new cultures among members of any group. Effective people generate culture daily through how they live and work, as a primary way of being in the world. Changing and creating organizations involves having ways of building coalitions and movements out of unmotivated unorganized masses of people. It involves having a way of reversing cultures that generate insoluble recrudescing problems. It involves having ways of teaching, not individual people, but entire organizations so how they operate gets studied and improved. Effective people use, revise, create, and combine organizations with facility toward achieving their ends. Using diversity involves having ways of mastering the roles of other genders, age groups, nationalities, cultures, professions, eras and the like, and using aspects of them yourself as extensions of your personal role repertoire. It also involves replacing whole sets of leaders with other sets dominated by particular types of culture, gender, age, nationality, profession, or other diversity dimension. It involves ability to transplant practices from one culture to another.

Effective people use diversity astutely to get things done, and they get things done inside and around diverse sorts of diversity. Impacting society involves having ways of changing self and situation, inventing never seen before things, processes, and arrangements, getting things done by groups that others do individually, and letting go of self enough to effectively care for others in strategic ways. Changing self and situation starts with having a way of finding the cost of every talent you have and not letting it undermine what you do when exercising that talent. It also involves having a way of replacing, continually, how you presently do functions with new means, invented, borrowed, or copied. It finally involves systematic comparison of how you do things with whoever in the world is better at doing similar things and learning from them. Effective people manage the costs of what they have become, the means by which they do things, and do this in strict relation to whoever is best in the world at doing similar functions. Inventing involves having ways of harnessing the evolutionary dynamics among ideas, technologies, and markets. It involves combining diverse separate industries, that is, the ideas and trends in those industries, to continually evolve new nascent industries and products. It involves extrapolating from the most unusual, to you, products in a market, principles of that market, and new inventions more extremely embodying those principles. Effective people have ways of manufacturing invention, not depending on one-time "big" insights. Getting things done by groups now done by individuals involves having ways of optimally using facilities to get cognitive work done, as people pass through, around, or into them. It involves having ways of becoming an expert in fields completely new to one in days, not weeks or years. It involves having ways of getting work that takes small professional staffs months or years to do, done in days in mass workshop events by dozens or hundreds of people. Effective people use people to multiply the speed, quality, thoroughness, and volume of cognitive work done. Letting go of self enough to strategically care for others is key to effectiveness. It exposes people to new emotions, stabilizes personality and emotion, and exposes people to new ideas, situations, and people. It involves designing environments that transform minds, ideas, capabilities, and people. It involves designing basic units that inter-relate to do a function and achieve viral growth. It involves having a way of self funding growth of new ideas and products. Effective people match the immensity of unmet human need with tactics that have automatic replication built in. The scale of their solving matches the scale of the problems they solve, rather than romantic "helping" of a few while immense crowds still suffer.

Effective people develop style. This can take the form of charisma, charm, elan, aura, care and other intangibles so that effective people speak to others both with actual direct content as well as intangible haunting suggestion and enticement. They deploy emotionally and cognitively in parallel. This involves having a way of creating (hence, a way of surprising others), having a way of managing emotion, having a way of detaching when things get serious, and having a way of continually caring in places and ways that others cannot match. Creating involves having a way of alternating engagement with detachment, building up an index of failures till they, collectively, inversely define a possible solution. It involves having a way of seeing relationships between ideas and entities in extremely different domains. It involves having a way of modeling all that is known in many categories on each of many levels, then expanding all category sequences and level sequences in the model to generate dozens or hundreds of new ideas at once, all ordered in relations to existing knowledge. Effective people automate inventing and creating, using well honed procedures. Managing emotion involves having a way of observing yourself, standing emotionally outside yourself, while you are in any situation whatsoever. Powerful meditation disciplines give people this ability. Managing emotion also involves becoming a mood artist, learning to design environments that force people into forms of mood and happiness, rare in their lives. It finally involves having ways of cultivating relationships with people--mostly by showing them their worth and importance again and again when they are doubting themselves. Effective people nurture the emotions in their own lives and in lives of others, both by stepping back from emotionality in powerful ways and by creating specific emotions in equally powerful ways. Detaching when things get serious is vital to all forms of effectiveness. It involves having a way of switching contexts, operating in new and unusual contexts, detaching from whatever context is forcing itself on you and others from environments and situations you are now in. It involves having ways of clowning--revealing truths too painful and powerful to ever be directly expressed, using humor, song, wit, joke, questioning, puzzlement. You must be able to lightly and sympathetically name the selfish, evil, nasty, harmful aspects of people and situations around you in every situation of your life. It finally involves having ways of cloaking power, acting with force and influence, without being seen as doing so. You must have ways to be powerful while looking

innocuous and passive. Effective people use humor as a weapon, to deliver truth where less witty and humorous persons, burn things up by being too direct or ruin them by avoiding powerful operant truths at the center of situations or persons.

Effective people have ways of continually caring in places and ways others cannot match. This involves having a way of seeing the immature stages within your own way of thinking about moral and leadership situations. It involves having a way of planning and standing responsible for the reactions of stakeholders to the reactions of other stakeholders to aspects of what you do. You stand aware of and responsible for second order non-linear side-effects of whatever main effects you plan and intend. It involves having a basis for moral action, and creating such bases in groups you are involved with. You establish the requisites of people knowing about and caring about other people rather than depending on people following some "do good" rules as a basis of moral action. Effective people establish the basis of caring among people rather than imposing rules and "do good" attitudes blindly.

Effective people regularly and continually upgrade their own performance and the performance of those around them. This involves upgrading sensitivity and awareness through art, upgrading mental acuity and performance through study, upgrading social power and impact through gaming, and upgrading ability, focus, and productivity via greater leveraging of abilities. Upgrading sensitivity and awareness through art involves having a way of naming the nascent things just entering your consciousness, and the things at the very edges of your consciousness. It involves separating the different layers of how you respond to stimuli and working for unbiased completeness of sensation at each layer before moving to the next layer of response. It involves getting other people to invent art that communicates to all the new challenges, psychic weaknesses, and emotional blocks to futures they desire each year. Effective people use art to improve performance, keeping psychic innovation linked to social influence and impact innovation. Upgrading mental acuity and performance through study involves basing your life on evidence not opinion. This means eating breakfast that protects you from major disease rather than eating what your mom prepared or what you "like" based on mere opinion. More and more of your daily living gets based on evidence, proven results of research. It involves continually forming study groups that tackle extremely hard subjects by repeated reading the same chapter four, five, and more times, getting a little more each time till finally all becomes clear to the study group's members. It involves selecting a type of self to be, a technique that many domains of the world can use, and a domain in the world to contribute to, early in college life or just after. Effective people create formal study groups and processes in every group and job and week of their lives, tackling ideas beyond what they can comfortably learn, and strategically choosing what to study so as to link themselves and their destinies strongly to newly emerging important parts of the world. Upgrading social power and impact through gaming involves translating actual social situations into game formats and thereby seeing bold interesting moves you can make to impact those games. It involves identifying the types of game space your social or political situations amount to and using that information to make appropriate moves. It involves having a way of studying the game rules, plays of others, and best game performers around you, then deliberately turning serious situations into less serious and intimidating games that you boldly challenge or change the rules of. This is a type of courage to "game" situations others treat as immovable.

Effective people demystify and remove intimidation from situations, seeing current arrangements as temporary, fallible, partial, provisional arrangements in an evolving human learning process, not endpoints or "correct" eternal givens to be obeyed and lived within the rules of. Effective people game the world, instead of merely obeying it. Upgrading ability, focus, and productivity via leveraging abilities better involves having a way of building a vast repertoire of well-practiced, structured moves and responses to select your actual response to current situations from. It involves having a way of establishing a hierarchy of disciplines of executing any particular function you do. It involves having a way of doing things three ways: redirecting historic forces, rebalancing abstract dynamics in a situation, or tuning interaction of a social automaton of people interacting in small local neighborhoods using standard behaviors of acting and reacting. Effective people are repertoire people. They have built up well-practiced routines for self and others to use and easily switch among those routines to tune any situation to high performance.

Effective people influence people in all channels, modalities, and dimensions. This involves having a way of programming behaviors, devices, and self, that is, pre-built pre-practiced repertoires of routines instantly deployable or re-deployable in situations. It involves researching particular situations to enough depth that actual causal factors and outcomes of importance are identified along with ways of affect them. Effective people find how to use aspects of new situations to influence people. Influencing also involves having a way of presenting and speaking to people that moves them rationally, emotionally, socially, and spiritually. It ends in having a way of brokering, bargaining, negotiating, and compromising among diverse interests and traditions. Programming your self and others involves having a way of directing all features of social programs and software programs you make to the root causes of exactly those process steps whose dysfunctions cause outputs of the processes to displease customers of the process. It also involves inventing mini-languages of very abstract operands and very abstract operators applying to those operands to model complex situations using a minimal number of types of objects. Modeling genius allows precise application of persuasion, force, input, or resource to influence things at minimal cost. Sloppy modeling diffuses all inputs and influences till their effects are minimal. It also involves having ways of getting groups to invent social or software programs for other people or software devices to use. Social and machine software are now primary avenues of influence in our world and cannot be left to manager or programmers. Researching situations involves having a way of quickly yet profoundly reading accumulated literatures of research by others on your topic. It involves having a way of rapidly yet thoroughly interviewing key players in a topic area for their most current ideas. It involves having a way of organizing the process of knowledge development via research through time so that finding key variables qualitatively is followed by finding measures that work for measuring those variables, which is followed by using data from measures of such variables to find which of them correlate with other variables.

Effective people are superb at getting knowledge rapidly about topics they now know nothing about. Presenting and speaking powerfully to others involves having a way of judging what type of presenting is great and what is not. It involves having a set of tools for turning any topic

into a great presentation. It involves having a repertoire of mini-presentations on sub-topics of many major topics, and a repertoire of major presentation components that allow new presentations to be quickly populated with known, proven, winning components. Effective people are great communicators to individuals and crowds. Negotiating well involves having a way of living negotiation so it become a way you life, getting practiced all day every day. It involves having a way of learning new frames that others use and building a repertoire of such frames so you can see meanings in messages that no one else detects. It involves having a way of setting up processes of interacting among parties and people so that a solace system emerges that makes the parties want each other to win. Effective people bring people and ideas together, not as one-time actions, but as a style of living each day. Complex configurations of human relations are a kind of artwork they love to build. Changing commonsense involves having a way of being productive, operating effectively in non-linear systems, generating complex outcomes from simple inputs, and implementing ideas effectively in noisy competitive unfocused environments. Being productive involves having a way of turning nearly all aspects of your life into products. It involves talking to the world through things or events you produce. It involves having a way of eliciting "the willing" within groups, communities, and organizations, then forming them into effective new ways of work toward new products of work. It involves having a way of globalizing quality by meshing the primary types of quality from diverse global movements in everything you implement. Effective people have ways of producing a lot, with quality that astonishes. Operating effectively in non-linear systems involves having a way of designing things that selfconsciously evolve, not designing them the same way you design machines and buildings. It involves having ways of predicting myriad non-linear and indirect side-effects of main intended actions. It involves having ways of anticipating types of surprise that may happen and inventing countermeasures. Effective people plan on being surprised by unintended side-effects. They plan on situations evolving and customer requirements changing as products are received. They live evolutionary lives. Generating complex outputs from simple inputs is an almost magical quality that effective people share. It involves a way of setting up darwinian style populations of competing ideas and individuals to get things done. It involves using biologic style processes of work instead of mechanical ones. It involves ways of organizing people into automata patterns and tuning their interactions till better-than wanted results emerge. Effective people replace "design" with "emergence". Implementing ideas effectively involves sharing pain. Instead of letting happenstance aspects of the goal being achieved make suffering and work unequal among those achieving it, effective people reallocate roles so all bear nearly equal costs from goal achievement. It involves setting up phase gates and making projects meet the requirements of each gate before moving on, resisting all calls of people, schedules, or budgets to do otherwise. It involves optimizing the flow of energy through a group of people or through an organization or through a device towards the ideal intended direction and actions, leaving little or no energy around to create trouble, distraction, or under-mining costs and side-effects. Effective people align the emotions, the sub-goals, and the energy flows of work perfectly to turn idea into reality.'

## Appendix 2 Lifewide Learning Survey January 2010 (n=309)

*Which of these experiences have you had while you have been studying at the University of Surrey and to what extent have they contributed to your personal or professional development?*

Figures in percent 1=not significant 5 = extremely significant (6=no response)

Types of experience	1	2	3	4	5	6
Looking after yourself	3	4	10	34	46	3
Being a parent	48	5	6	4	4	33
Caring for someone	28	13	11	13	8	27
Having a part-time job(s)	20	6	13	20	20	21
Having a full-time job(s)	38	5	6	6	14	32
Creating a business	44	6	6	3	5	36
Volunteering	22	9	13	20	13	23
Travel	15	12	16	21	19	17
Living in another country	34	3	4	12	19	29
Meeting / interacting with people from other cultural backgrounds	4	6	19	31	34	6
Being ill	22	14	21	17	7	20
Organising something	6	6	22	29	23	14
Fund raising	29	11	11	13	4	32
Doing a marathon	33	11	10	12	2	32
Duke of Edinburgh Award	50	3	4	3	1	38
Learning another language	31	7	10	12	12	28
Learning a skill (learning to drive, flying, sailing, skiing, painting...)	26	9	14	14	9	28
Playing sport	23	10	15	17	14	21
Playing music	13	10	16	27	22	13
Active involvement in other creative enterprises	21	11	18	9	9	32
Mentoring or coaching others	24	12	14	15	8	28
Training courses	24	9	15	13	8	31
Being part of a drama group or other society on or off campus	33	7	8	11	10	30
Being part of a religious community	40	6	6	6	6	35
Participating in activities organised by the SPLASH	36	7	7	10	25	15
Participating in activities organised by SCEPTRE	35	7	7	13	6	33
Participating in activities organised by the Careers Service	29	7	10	13	9	31
Participating in activities organised by USSU	17	11	16	20	14	23